

digital

DQII
Engineering Drawings
Digital Equipment Corporation

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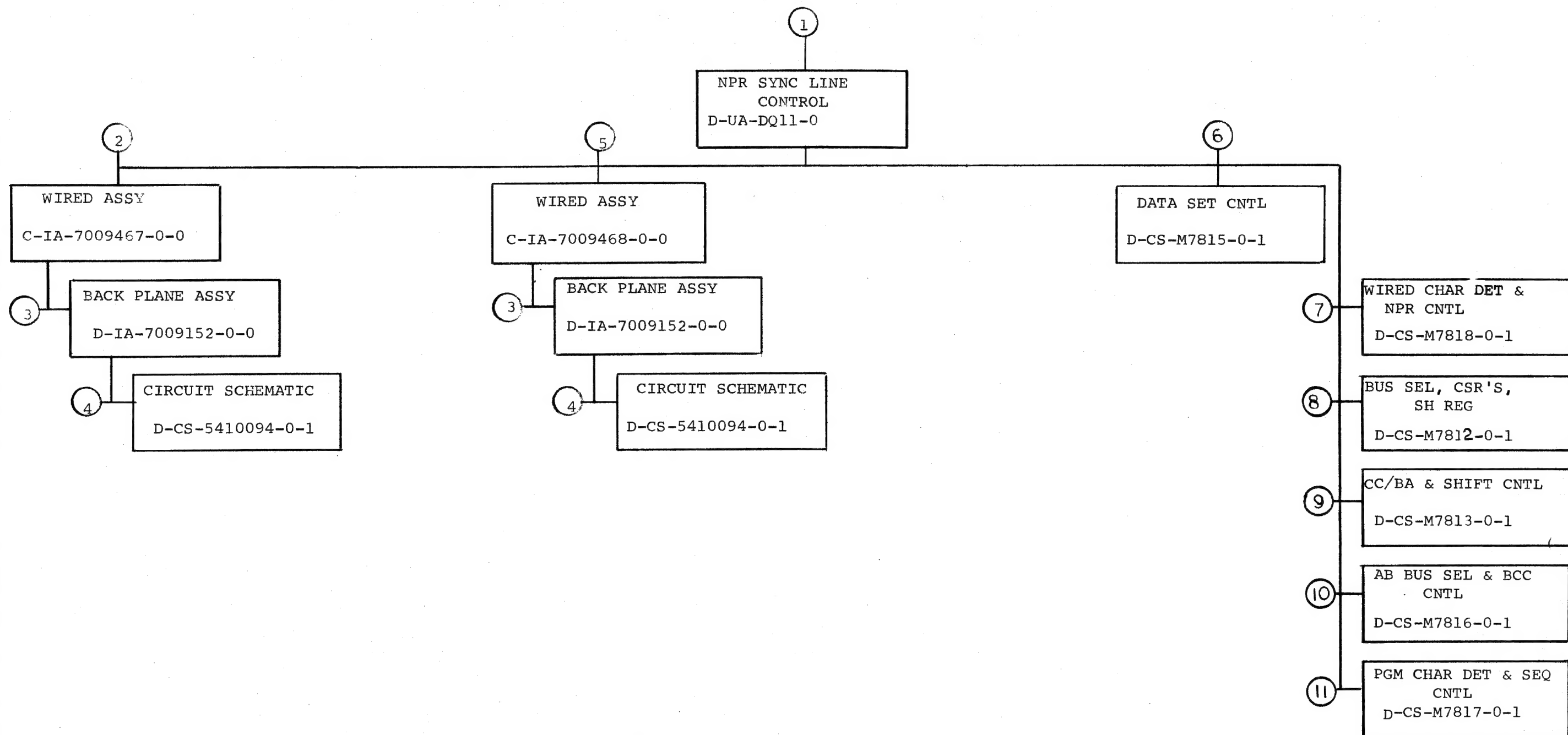
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SEQUENCE

C-IA-7009467-~~0-0~~
K-WL-DQ11-~~0-12~~
D-IA-7009152-~~0-0~~
C-IA-7009468-~~0-0~~
K-WL-DQ11-~~0-14~~
D-CS-H315-~~0-1~~
B-DD-DF11-~~0~~
A-AL-DO11-~~0-3~~
D-IA-7009563-~~0-0~~
A-WT-7009468-~~0~~

UNIT VARIATIONS

REVISIONS



TITLE	SHEET 2 OF 4	SIZE CODE	NUMBER	REV
NPR SYNC LINE CONTROL	B DD	DQ11-0		L

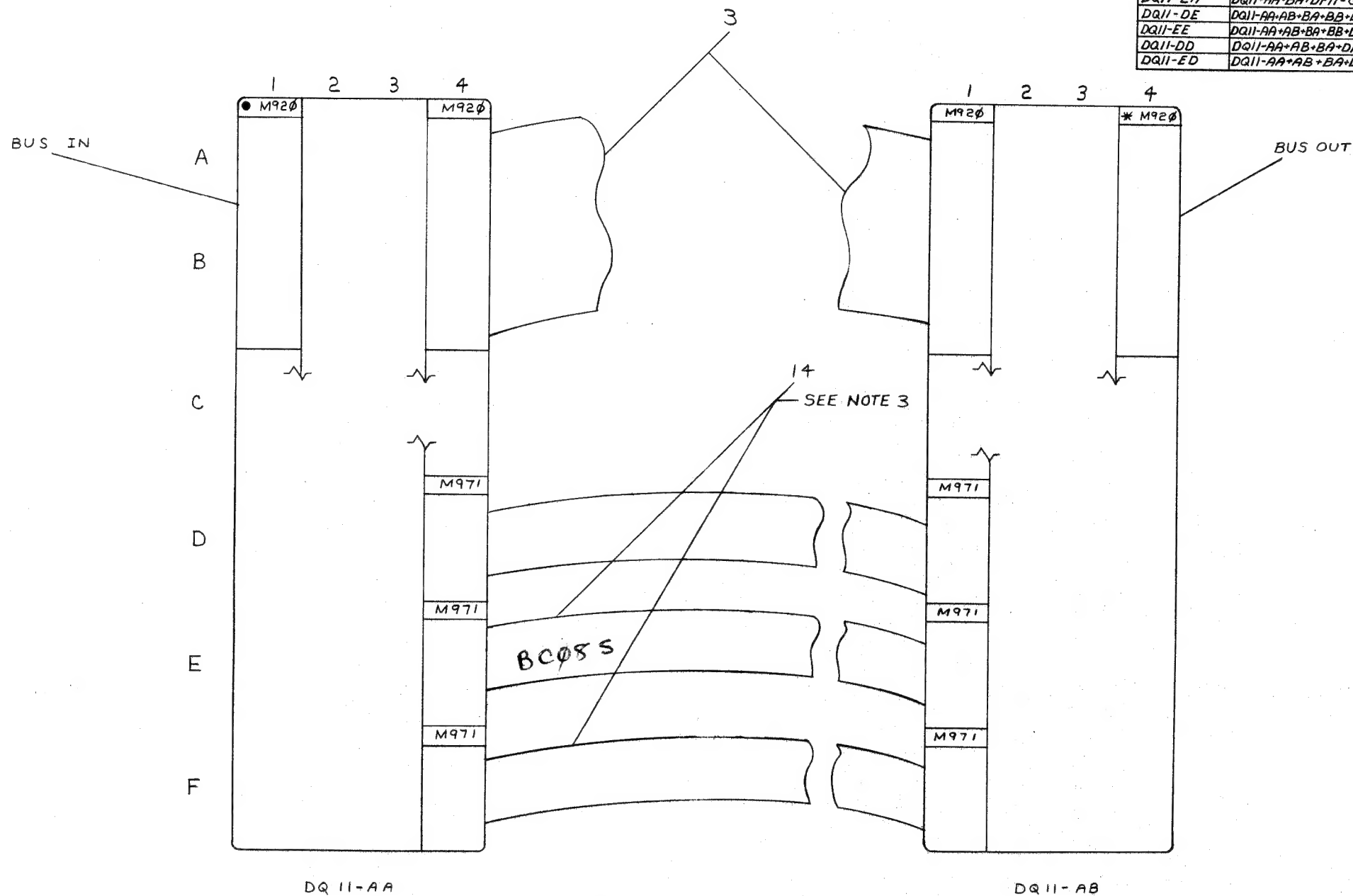
CUSTOMER PRINT SET				ELECTRICAL										CUSTOMER PRINT SET				ELECTRICAL									
DQ11-Q	DQ11-KA			MFG. SET	FIND NO.	DRAWING NO.	REV	NO OF SHT	DESCRIPTION	OPTION NO./FILE DATE	DQ11-Q	DQ11-KA			MFG. SET	FIND NO.	DRAWING NO.	REV	NO OF SHT	DESCRIPTION	OPTION NO./FILE DATE						
X					1	D-UA-DQ11-0-0	A	1	NPR SYNC LINE CONTROL		X					5	C-IA-7009468-0-0	*	1	WIRED ASSY (DQ11-AB)							
X						A-PL-DQ11-0-0	A	1	NPR SYNC LINE CONTROL		C						K-WL-DQ11-0-14	E	1	WIRE LIST (DQ11-AB)							
X						D-MU-DQ11-0-1	*	1	MODULE UTILIZATION (AA)		X						A-WT-7009468-0	#	1	AWT STATUS REV							
X						D-MU-DQ11-0-2	*	1	MODULE UTILIZATION (AB)																		
X						A-AL-DQ11-0-3	A	1	DQ11 ACCESSORY LIST																		
C						B-DD-DF11-0	#	1	LEVEL CONVERTERS + CABLES																		
X						D-BD-DQ11-0-4	*	1	DF11 CONV/CABLE																		
X						D-BS-DQ11-0-5	*	1	ADDRESS INTERRUPT CLOCK																		
X						D-IC-DQ11-0-6	*	1	UNIBUS CONNECTORS																		
X						D-IC-DQ11-0-7	A	1	DQ11-AA/DQ11-AB CONNECTORS		X					6	D-CS-M7815-0-1	#	2	DATA SET CNTL							
						A-SP-DQ11-0-8	*		ENGINEERING SPEC								K-CO-M7815-0-4		1	X-Y COORDINATE HOLE LOCATION							
						A-SP-DQ11-0-9	*		TEST PROCEDURE								D-AH-M7815-0-5		1	ASSY/HOLE LOCATION							
						A-SP-DQ11-0-10	*		ACCEPTANCE PROCEDURE								B-MH-M7815-0-6		1	MODULE ECO HISTORY							
X						D-CS-M920-0-1	#	1	INTERNAL BUS CONN																		
X						D-CS-M105-0-1	#	1	ADDRESS SELECTOR																		
X						D-CS-M7821-0-1	#	2	INTERRUPT CONTROL MODULE		X					7	D-CS-M7818-0-1	#	4	WIRED CHAR DET & NPR CNTL							
X	X					D-CS-M4050-0-1	#	1	CRYSTAL CLOCK								K-CO-M7818-0-4		1	X-Y COORDINATE HOLE LOCATION							
X						D-CS-H315-0-1	#	1	MODEM TEST CONN								D-AH-M7818-0-5		1	ASSY/DRILLING HOLE LAYOUT							
																	B-MH-M7818-0-6		1	MODULE ECO HISTORY							
											X					8	D-CS-M7812-0-1	#	10	BUS,SEL CSR'S,SH REG							
X						C-IA-BC08S-0-0	#		I/O CABLE ASSY								K-CO-M7812-0-4		1	X-Y COORDINATE HOLE LOCATION							
X						D-IA-7009563-0-0	#	1	DALL-F/DD11-B OPTION HARNESS								D-AH-M7812-0-5		1	ASSY/DRILLING HOLE LAYOUT							
X						D-CS-M971-0-1	#		CABLE CONNECTOR								B-MH-M7812-0-6		1	MODULE ECO HISTORY							
						A-SL-DQ11-0-11	*		SOFTWARE LIST		X					9	D-CS-M7813-0-1	#	10	CC/BA & SHIFT CNTL							
						A-SP-DQ11-0-13	*		MODULE TEST PROCEDURE								K-CO-M7813-0-4		1	X-Y COORDINATE HOLE LOCATION							
X					2	C-IA-7009467-0-0	B	1	WIRED ASSY(DQ11-AA)								D-AH-M7813-0-5		1	ASSY/DRILLING HOLE LAYOUT							
C						K-WL-DQ11-0-12	D	1	WIRE LIST (DQ11-AA)								B-MH-M7813-0-6		1	MODULE ECO HISTRY							
						A-WT-7009467-0	#	1	AWT STATUS REV		X					10	D-CS-M7816-0-1	#	7	AB BUS SEL & BCC CNTL							
X					3	D-IA-7009152-0-0	#	1	BACK PLANE ASSY								K-CO-M7816-0-4		1	X-Y COORDINATE HOLE LOCATION							
						C-SC-1209583-0-1		1	CASTING,THREE BLOCK								D-AH-M7816-0-5		1	ASSY/DRILLING HOLE LAYOUT							
																	B-MH-M7816-0-6		1	MODULE ECO HISTORY							
					4	D-CS-5410094-0-1		1	CIRCUIT SCHEMATIC		X					11	D-CS-M7817-0-1	#	7	PGM CHAR DET & SEQ CNTL							
						K-CO-5410094-0-4		1	X-Y COORDINATE HOLE LOCATION								K-CO-M7817-0-4		1	X-Y COORDINATE HOLE LOCATION							
						E-AH-5410094-0-5		1	ASSY/DRILLING HOLE LAYOUT								D-AH-M7817-0-5		1	ASSY/DRILLING HOLE LAYOUT							
						B-MH-5410094-0-6		1	MODULE ECO HISTORY								B-MH-M7817-0-6		1	MODULE ECO HISTORY							
CUSTOMER PRINT SET CODES				X = PRINT OF DOCUMENT INCLUDED IN PRINT SET C = INCLUDES ALL PRINTS INDICATED ON DOCUMENT S = CONFIDENTIAL AUTHORIZED SIGNATURE REQUIRED										TITLE				SHEET 3 OF 4				SIZE CODE		NUMBER		REV	
														NPR-SYNC LINE CONTROL								B DD		DQ11-0		L	

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LEGEND	
VAR	TITLE
DQ11-AA	BASIC SYNC CONTROL
DQ11-BA	DATA SET CONTROL
DQ11-AB	BCC CONTROL
DQ11-BB	PROTOCOL CONTROL
DQ11-KA	CRYSTAL CLOCK (M4050)
DQ11-DA	DQ11-AA*BA*DF11-A
DQ11-EA	DQ11-AA*BA*DF11-G
DQ11-DE	DQ11-AA*AB*BA*BB*DF11-A
DQ11-EE	DQ11-AA*AB*BA*BB*DF11-G
DQ11-DD	DQ11-AA*AB*BA*DF11-A
DQ11-ED	DQ11-AA*AB*BA*DF11-G

NOTES:

- IF FIRST UNIT IN EXPANDER BOX. REPLACE M920 WITH BC11A-XX
- * IF END OF BUS REPLACE M920 WITH M930
- CABLES ARE BC08S. IF BC0BR IS SUBSTITUTED THEN ONE END OF THE CABLE SHOULD BE REVERSED
- FOR ALL 11/45 CPU'S WITH S/N *S LESS THAN 2000 USE HARNESS 7009162. FOR 11/35-11/40 CPU'S WITH S/N LESS THAN 6000 OR H960-D/E WITH S/N LESS THAN 7000 USE HARNESS 7009099.



DQ11-AA
BASIC SYNC
CNTRL

DQ11-AB

REV	CHANGE NO.	DATE
A	1	5-1-74
B	2	5-1-74
C	3	5-1-74
D	4	5-1-74
E	5	5-1-74
F	6	5-1-74

DEC FORM NO
DRD 100-A

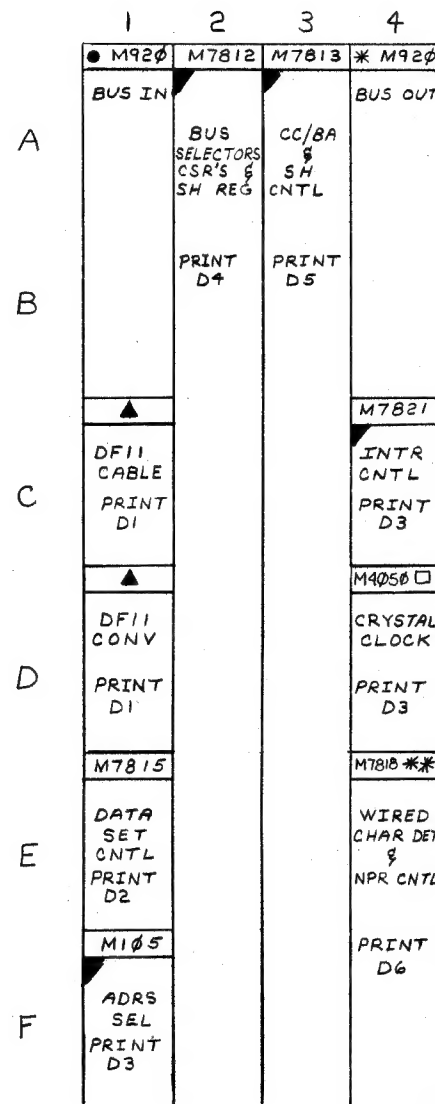
FIRST USED ON OPTION/MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11				
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES TOLERANCES	DRN. <i>E. Wilson</i> DATE <i>8/27/73</i> CHK'D. <i>R. Wall</i> DATE <i>11/1/73</i> ENG. <i>R. Wall</i> DATE <i>12-10-73</i> PROJ. ENG. <i>R. Wall</i> DATE <i>1-10-74</i> PROD. <i>R. Wall</i> DATE <i>12-11-73</i>	PARTS LIST		
DECIMALS .XXX = .008 .XX = .02 .X = .1	ANGLES ±0° 30'	TITLE NPR SYNC LINE CONTROL		
MATERIAL	REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY	NEXT HIGHER ASSY.		
FINISH		SCALE NONE		
SHEET 1 OF 1		SIZE CODE	NUMBER	REV.
		DQ11-0-0	DQ11-0-0	A

DIGITAL EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS			QUANTITY / VARIATION												
PARTS LIST			DQ11-AA	DQ11-BA	DQ11-AB	DQ11-BB	DQ11-KA		DQ11-DA	DQ11-EA	DQ11-DE	DQ11-EE	DQ11-DD	DQ11-ED	
MADE BY	E. Wilson	CHECKED													
DATE	8/29/73	DATE													
ENG	R. F. Jones	PROD													
DATE	12-10-73	DATE													
ITEM NO.	DWG NO. / PART NO.	DESCRIPTION													
1	C-IA-7009467-0-0	WIRED ASSY (DQ11-AA)	1						1	1	1	1	1	1	
2	C-IA-7009468-0-0	WIRED ASSY (DQ11-AB)			1						1	1	1	1	
3	D-CS-M920-0-1	INTERNAL BUS CONN	1		1				1	1	2	2	2	2	
4	D-CS-M105-0-1	ADDRESS SELECTOR	1						1	1	1	1	1	1	
5	D-CS-M7821-0-1	INTERRUPT CONTROL MODULE	1						1	1	1	1	1	1	
6	D-CS-M4050-0-1	CRYSTAL CLOCK					1								
7	D-CS-M7815-0-1	DATA SET CNTL		1					1	1	1	1	1	1	
8	D-CS-M7818-0-1	WIRED CHAR DET & NPR CNTL	1						1	1	1	1	1	1	
9	D-CS-M7812-0-1	BUS SEL, CSR'S, SH REG	1						1	1	1	1	1	1	
10	D-CS-M7813-0-1	CC/BA & SHIFT CNTL	1						1	1	1	1	1	1	
11	D-CS-M7816-0-1	AB BUS SEL & BCL CNTL			1						1	1	1	1	
12	D-CS-M7817-0-1	PGM CHAR DET & SEQ CNTL				1					1	1			
13	D-CS-M971-0-1	CABLE CONNECTOR			6						6	6	6	6	
14	C-IA-BC08S-1	I/O CABLE ASSY			3						3	3	3	3	
15	B-DD-DF11-A	EIA/CCITT CONV-CABLE							1		1		1		
16	B-DD-DF11-G	301/303 CONV-CABLE								1		1		1	
17	D-CS-H315-0-1	MODEM TEST CONNECTOR							1		1		1		
18	D-PS-12-11284-04	SW DUST COVERS (8 POS)	9						9	9	9	9	9	9	
19	C-IA-5408778-0-0	PRIORITY JUMPER LEVEL #5	1						1	1	1	1	1	1	
20	D-IA-7009099	POWER HARNESS	1		1				1	1	2	2	2	2	
21	D-IA-7009563-0-0	DA11-F/DD11-B OPTION HARNESS	1		1				1	1	2	2	2	2	
TITLE			ASSY NO.			SIZE CODE			NUMBER			REV.		ECO NO.	
NPR SYNC LINE CONTROL						A PL			DQ11-0-0			A		DQ11-00001	
SHEET 1 OF 1			DIST.												

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NOTES:

- IF FIRST UNIT IN EXPANDER BOX REPLACE M920 WITH BC11A.
- * IF END OF BUS REPLACE M920 WITH M930.
- ▲ DF11 OPTION REF MODULE VARIATION CHART.
- USE DQ11-KA OPTION (M4050 CRYSTAL CLOCK) IN DQ11-AA. IF USING DQ11-AB, M971 CABLE MODULE SHOULD BE IN THIS SLOT FOR REFERENCE OF RELOCATION OF M4050. SEE D-MU-DQ11-0-2.
- ** IF USING DQ11-AB THESE SLOTS ARE M971 CABLE MODULES. FOR REFERENCE OF LOCATION OF M7818, SEE D-MU-DQ11-0-2.
- DQ11-AA STD. MODULES ARE M920, M105, M7821, M7812, M7813. ALL OTHERS MAYBE SELECTED VIA OPTIONS AS SHOWN IN THE MODULE VARIATION TABLE.
- IF M971 REF PRINT D-IC-DQ11-0-7 FOR DQ11-AA/DQ11-AB (D7-1) CONNECTIONS.



MU
DQ11-AA (NOTE 6)

MODULE VARIATIONS (DQ11-AA)

SYSTEM CONFIGURATION	SLOT C1	SLOT D1	SLOT E1	SLOT D4	SLOT E4, F4
E1A DQ11-DA	BC01R-XX	M594	M7815	++	M7818 (NOTE 5)
20m DQ11-EA	BC01W/M970	M595	M7815	++	M7818 (NOTE 5)
DQ11-DE	BC01R-XX	M594	M7815	++	M971 (NOTE 5)
DQ11-EE	BC01W/M970	M595	M7815	++	M971 (NOTE 5)
DQ11-DD	BC01R-XX	M594	M7815	++	M971 (NOTE 5)
DQ11-ED	BC01W-/M970	M595	M7815	++	M971 (NOTE 5)
DF11-A	BC01R-XX	M594	++	++	++
DF11-G	BC01W/M970	M595	++	++	++
DQ11-KA (NO DQ11-AB SYSTEM UNIT)	++	++	++	M4050 (NOTE 4)	++
DQ11-BA	++	++	M7815	++	++

→ DQ11 AB

NOTE 7

→

→

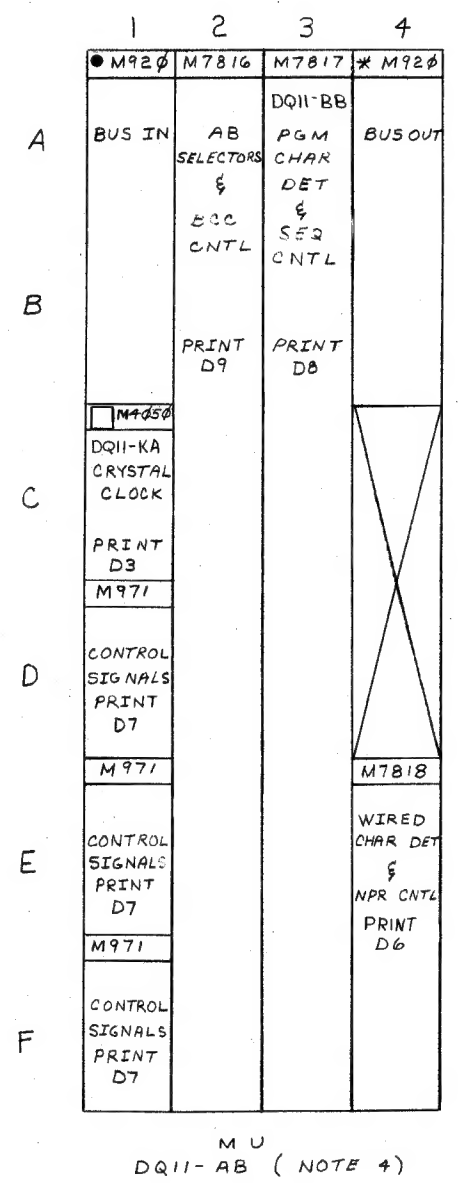
FIRST USED ON OPTION/MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11				
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES	DRN. <i>E. Wilson</i>	DATE <i>8/28/73</i>	PARTS LIST	
TOLERANCES	CHKD. <i>R. Wilson</i>	DATE <i>11/12/73</i>	digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS	
DECIMALS	ENG. <i>R. Wilson</i>	DATE <i>12-12-72</i>	TITLE	
ANGLES	PROJ. ENG. <i>R. Wilson</i>	DATE <i>12-12-72</i>	MODULE UTILIZATION (DQ11-AA)	
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY V	PROD. <i>R. Wilson</i>	DATE <i>12-11-72</i>	SIZE CODE NUMBER REV.	
MATERIAL	NEXT HIGHER ASSY.		D MU DQ11-0-1	
FINISH	SCALE NONE		SHEET 1 OF 1	

REVISIONS
CHANGE NO.
CHK

DEC FORM NO.
DRD 102-C

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- NOTES:
- IF FIRST UNIT IN EXPANDER BOX REPLACE M920 WITH BC11-A.
 - * IF END OF BUS REPLACE M920 WITH M781.
 - DQ11-KA (M4050) CRYSTAL CLOCK OPTIC.
 - DQ11-AB STD. MODULES ARE M920, M7816. THE DQ11-KA AND M7818 ARE RELOCATED FROM THE DQ11-AA SYSTEM UNIT. ALSO MODULE M7817 IS THE DQ11-BB OPTION.



MODULE VARIATIONS (DQ11-AB)

SYSTEM CONFIGURATIONS	SLOT C1	SLOT A3-F3
DQ11-BB	+	M7817
DQ11-KA	M4050	+

REVISIONS

REV	CHANGE NO
1	1

FIRST USED ON OPTION/MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11				
PARTS LIST				
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES				
TOLERANCES				
DECIMALS	ANGLES			
.xxx = .005	±0° 30'			
.xx = .02				
.x = .1				
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY Y				
MATERIAL				
NEXT HIGHER ASSY.				
B-CD-DQ11-0				
FINISH				
SCALE NONE				
SHEET 1 OF 1				
DIST.				

DATE 8/29/72
CHK'D. [Signature]
DATE 11/12/72
ENG. [Signature]
DATE 12-10-72
PROJ. ENG. [Signature]
DATE 12-10-72
PROD. [Signature]
DATE 12/1/72

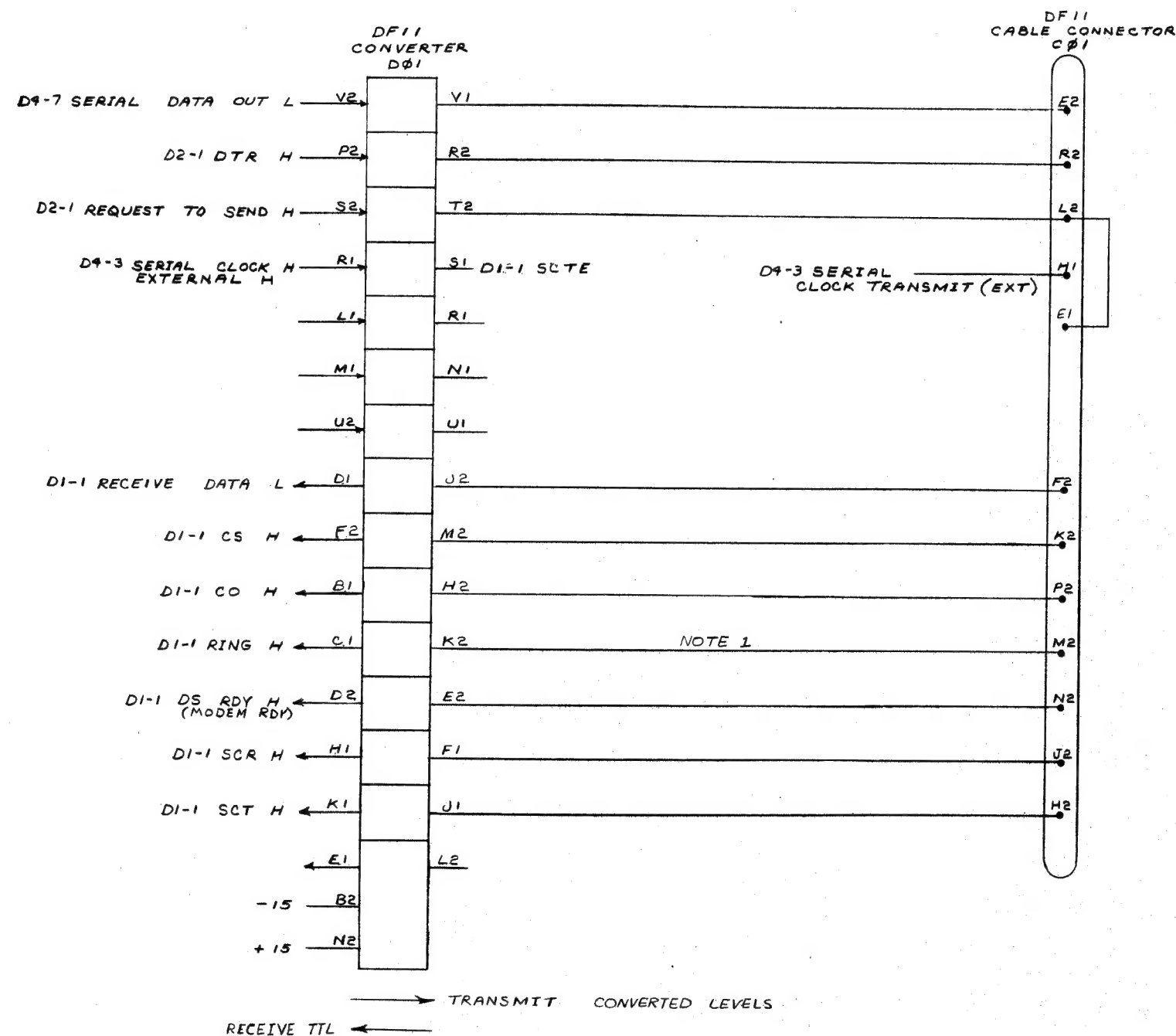
digital EQUIPMENT CORPORATION
MAYNARD, MASSACHUSETTS

TITLE
MODULE UTILIZATION
DQ11-AB

SIZE CODE NUMBER
D M U DQ11-0-2

REV.

NOTE: 1. DFIIA: IF RING LEAD IS OPEN AT MODEM END, CABLE CROSSTALK MAY CAUSE INTERRUPTS. EITHER GROUND COILML OR ADD A 33K 1/4W RESISTOR FROM E3(12) (M594) TO -15V. MODULE IS ETCHED ACCOMMODATE THIS RESISTOR.
2 THE BC01W-25 MUST HAVE ALL JUMPERS REMOVED EXCEPT THOSE LABELED 202 (TWO) AND 301 (TWO)



DFII	DFII CONV	DFII CABLE	NOTES
DFII-A	M594	BC01R-XX	EIA/CCITT
DFII-G	M595	BC01W-25/M970	BELL 301/303

REV.	CHG.	NO.
1	1	1

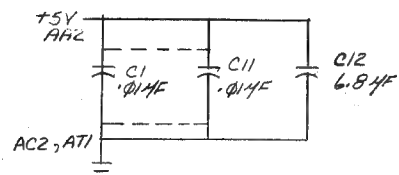
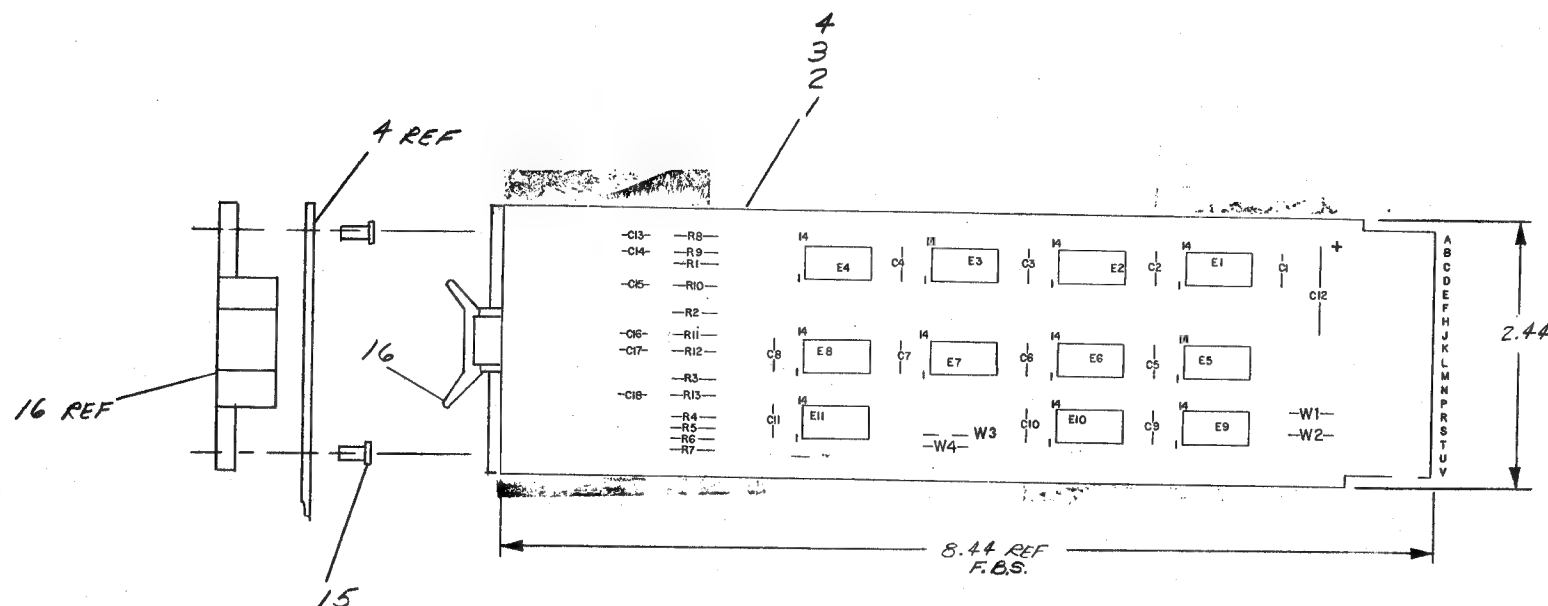
FIRST USED OR OPTION MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11				
UNLESS OTHERWISE SPECIFIED	DATE	PARTS LIST		
UNLESS OTHERWISE SPECIFIED	DATE	digital EQUIPMENT CORPORATION		
DIMENSION IN INCHES	DATE	MAYNARD, MASSACHUSETTS		
TOLERANCES	DATE	TITLE		
DECIMALS FRACTIONS ANGLES	DATE	DFII CONV/CABLE		
± .008 ± 1/64 ± 0°30'	DATE	(DI-1)		
FINAL SURFACE QUALITY	DATE	NUMBER		
REMOVE BURRS AND BREAK SHARP CORNERS	DATE	REV.		
MATERIAL	DATE	DQ11-0-4		
NEXT HIGHER ASS'Y	DATE	DIST.		
B-DD-DQ11-0	DATE	SHEET		
FINISH	DATE	OF		

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NOTES:

1. W1, W2, W3, W4 ARE MACHINE INSERTED JUMPERS.
2. REMOVE W4 TO INHIBIT RING INTERRUPTS.
3. REMOVE W3 TO INHIBIT INITIALIZE FROM CLEARING RS & DTR.
4. UNLESS OTHERWISE SPECIFIED RESISTANCE IS IN OHMS.
5. UNLESS OTHERWISE SPECIFIED CAPACITORS ARE 100V, 5%.

JUMPERS	FUNCTION
W1	INTERUPT IF UC 13
W2	INTERUPT IF UC 14
W3	INHIBIT INIT RS & DTR
W4	INHIBIT RING INTERRUPTS

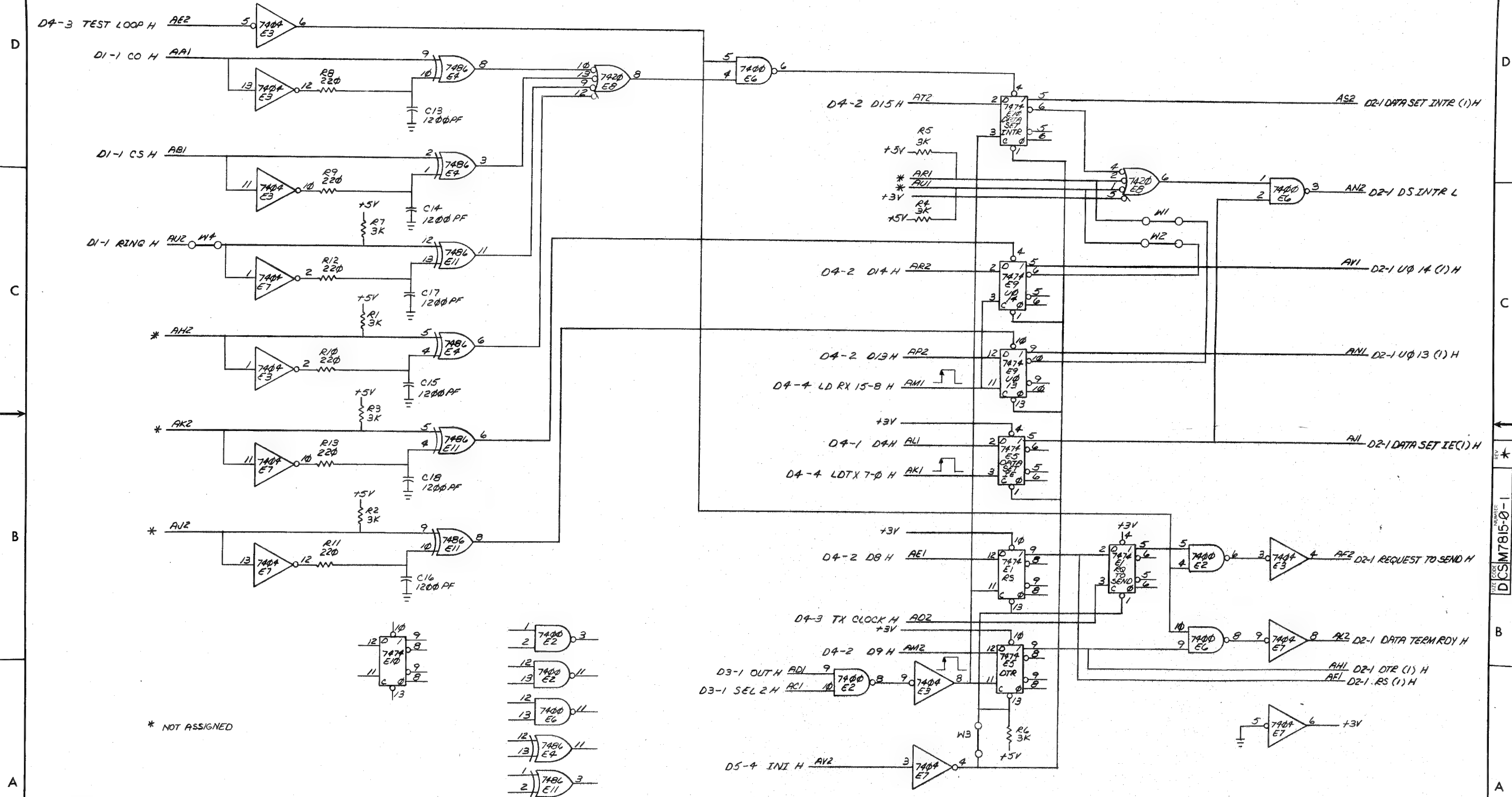


REF	X-Y COORDINATE HOLE LOCATION	K-10-N7815-0-4	1
REF	ASSY/DRILLING HOLE LAYOUT	C-9H-N7815-0-3	2
REF	MODULE ECO HISTORY	B-1M4-N7815-0-6	3
1	ETCHED CIRCUIT BOARD	5010500	4
11 C1-C11	CAPACITOR .01µF 50V 20% AXIAL CER	1001610	5
6 C13-C18	CAPACITOR 1200PF 100V 5% D.M.	1002424	6
1 C12	CAPACITOR 6.8µF 35V 10% STANT	1005306	7
6 R8-R13	RESISTOR 220 1/4W 5%	1300271	8
7 R1-R7	RESISTOR 3K 1/4W 5%	1300432	9
4 E1, E5, E9, E10	IC DEC 7474	1905547	10
2 E2, E6	IC DEC 7400	1905575	11
1 E8	IC DEC 7420	1905577	12
2 E3, E7	IC DEC 7404	1909686	13
2 E4, E11	IC DEC 7486	1910011	14
2	EYELET #GS4-7	9006732	15
1	HANDLE, FLIP-CHIP MAGENTA	9008337-6	16
PR W1-W4	BUS WIRE #22 AWG	9107560-01	17

QTY	REF DESIGNATION	DESCRIPTION	PART NO.	ITEM NO.				
PARTS LIST								
ETCH BOARD REV		A						
		DRN.	M. Pierce	DATE	4/2/73	digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS		
		CHKD.	Don [Signature]	DATE	7/12/73			
		ENG.	Don [Signature]	DATE	7/12/73			
		PROJ. ENG.	Don [Signature]	DATE	7/12/73			
		PROD.	R. Wall	DATE	7/13/73			
		NEXT HIGHER ASSY				TITLE DATA SET CONTROL		
		E-DD-DQH-0						
		SCALE NONE						
DEC NO.		EIA NO.		SIZE CODE		NI	ER	REV.
				D CSM7815-		-1		*
		SHEET		OF 2		DIST.		
CONVERSION CHART								

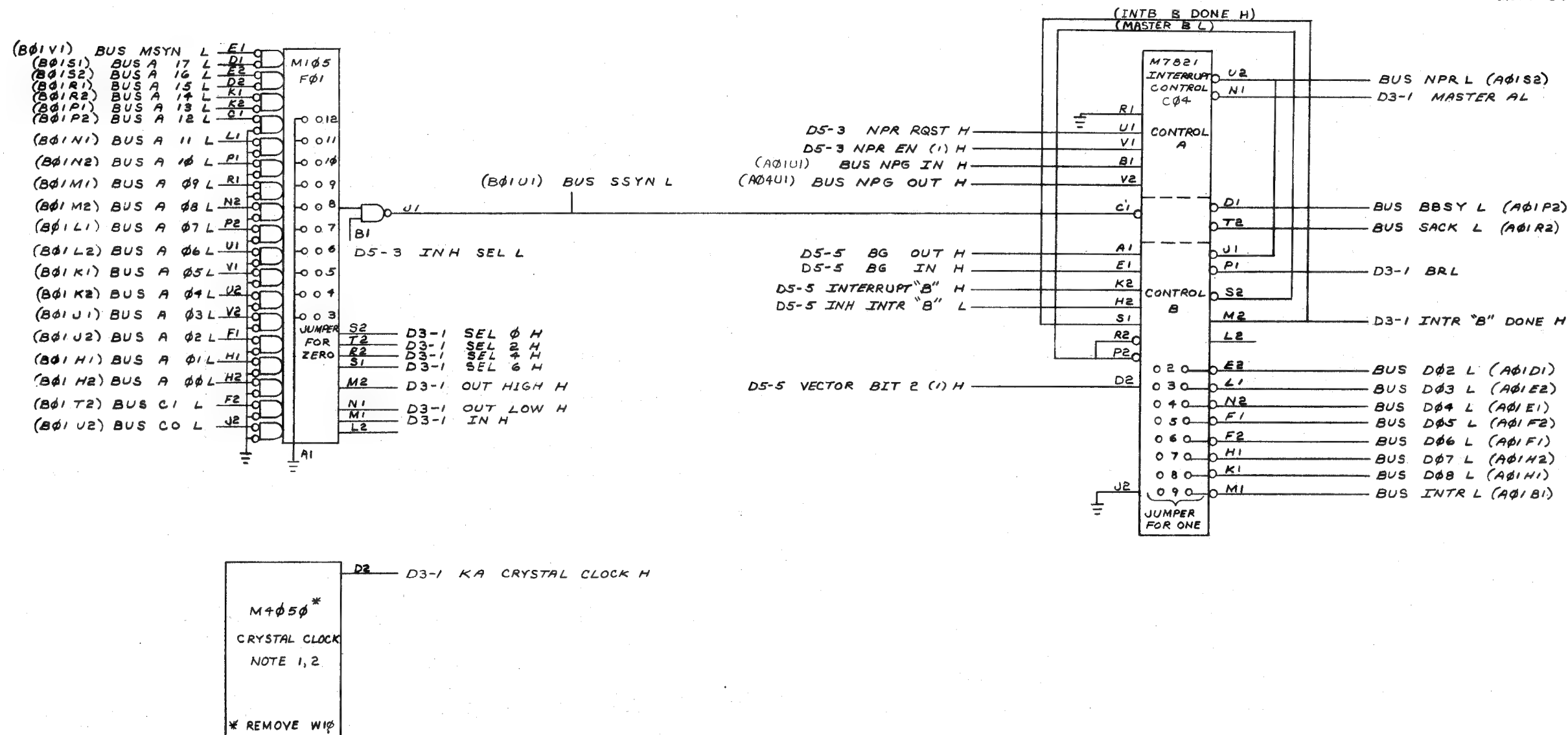
IC TYPE	GND	+ 5V
GND AND 5V ARE USUALLY PIN 7 AND 14 RESPECTIVELY. EXCEPTIONS ARE STATED ABOVE.		
IC PIN LOCATIONS		

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REVISIONS		
CHK	CHANGE NO.	REV.

- NOTES:
1. CRYSTAL FREQ. FOR SPECIFIED BAUD RATE
a) BAUD RATE < 250,000
CRYSTAL IS 16 X BAUD RATE
b) BAUD RATE > 250,000
CRYSTAL IS 2 X BAUD RATE
 2. MODULE LOCATION IS D04
IF DQ11-AA OPTION ONLY!
IF DQ11-AB OPTION IS USED
SLOT C01 IN DQ11-AB SYSTEM
UNIT IS USED.

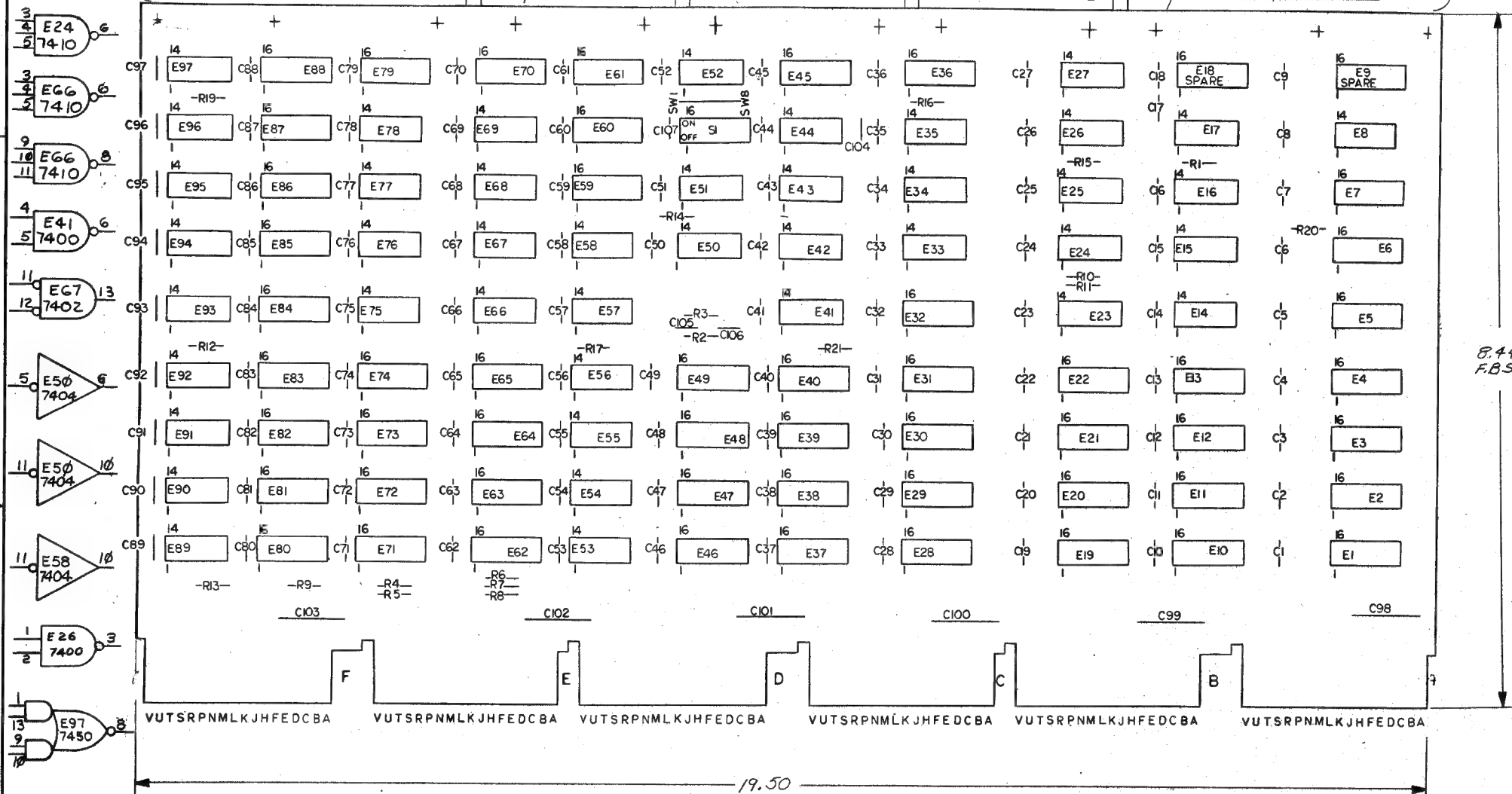


FIRST USED ON OPTION MODEL		QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11					
UNLESS OTHERWISE SPECIFIED		PARTS LIST			
UNLESS OTHERWISE SPECIFIED		digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS			
TOLERANCES		TITLE			
DECIMALS FRACTIONS ANGLES		ADDR., INTER. CONTROL & CLOCK (D3-1)			
± .005 ± 1/64 ± 0°30'		D3-1			
FINAL SURFACE QUALITY		D3-1			
REMOVE BURRS AND BREAK SHARP CORNERS		D3-1			
MATERIAL		B-DD-DQ11-0			
FINISH		SCALE NONE			
SHEET 1 OF 1		D3-1			

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NOTES:

SPARES



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D

C

B

A

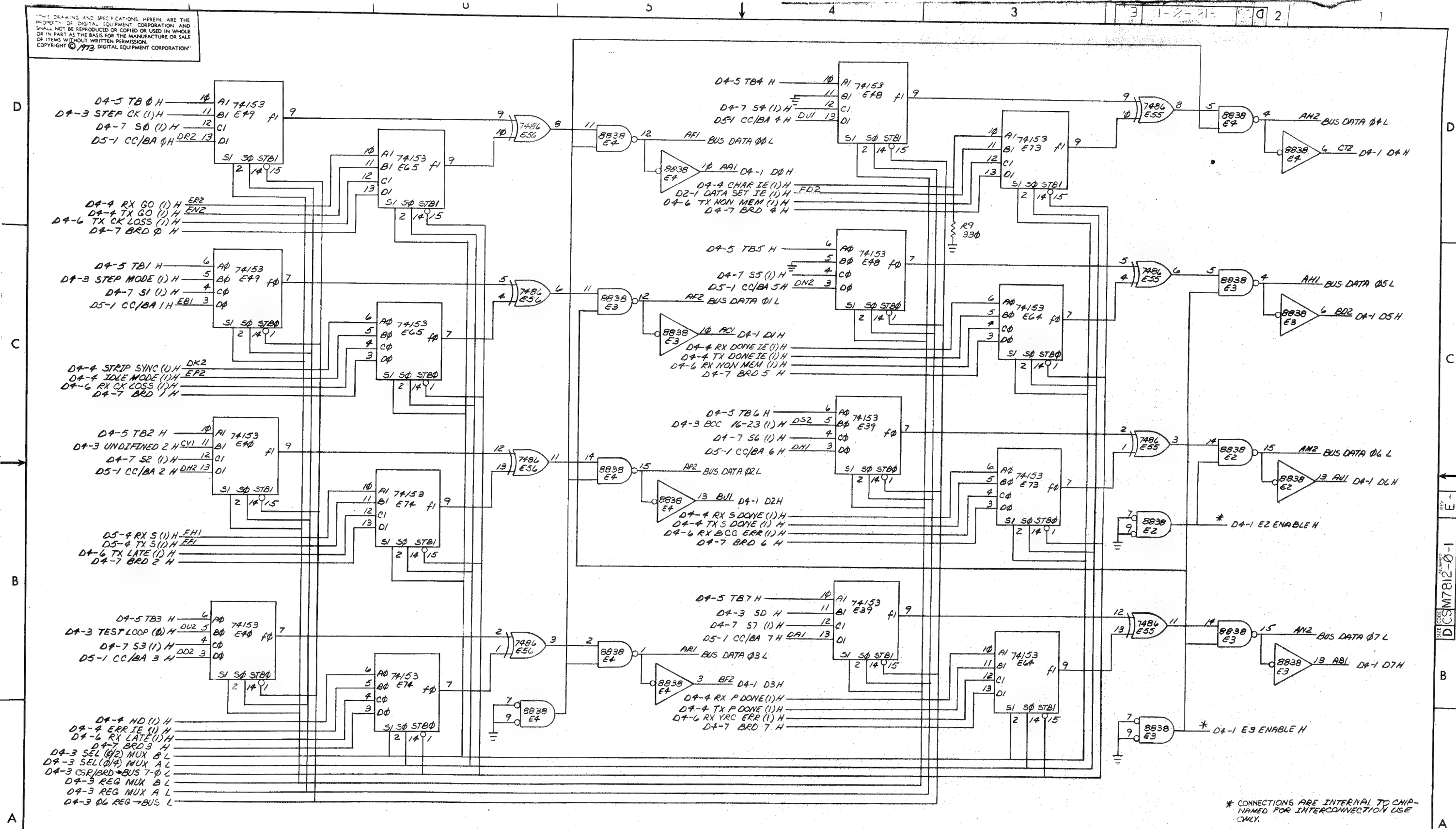
PIN	SIGNAL NAME	PAGE	D4-1	D4-2	D4-3	D4-4	D4-5	D4-6	D4-7
AF1	BUS DATA 00 L		X						
AF2	BUS DATA 01 L		X						
AP2	BUS DATA 02 L		X						
AR1	BUS DATA 03 L		X						
AH2	BUS DATA 04 L		X						
AH1	BUS DATA 05 L		X						
AM2	BUS DATA 06 L		X						
AN2	BUS DATA 07 L		X						
AK1	BUS DATA 08 L			X					
AP1	BUS DATA 09 L			X					
AL2	BUS DATA 10 L			X					
AJ2	BUS DATA 11 L			X					
AM1	BUS DATA 12 L			X					
AL1	BUS DATA 13 L			X					
AK2	BUS DATA 14 L			X					
AN1	BUS DATA 15 L			X					
EL2	D1-1 RING H			X					
EV2	D1-1 CO H			X					
EL1	D1-1 CS H			X					
EU1	D1-1 DS INTR (1) H			X					
DV1	D1-1 SCTE			X					
EE2	D1-1 RECEIVE DATA L			X					
EF1	D1-1 SCT H			X					
ED2	D1-1 SCR H			X					
EK1	D1-1 DS RDY H			X					
FD2	D2-1 DATA SET IE (1) H		X						
ES1	D2-1 RS (1) H			X					
EV1	D2-1 DTR (1) H			X					
EJ2	D2-1 U.O. 13 (1) H			X					
EK2	D2-1 U.O. 14 (1) H			X					
BL1	D2-1 BA 1T L			X					
CH1	D3-1 SEL 6 H			X					
BJ2	D3-1 SEL 0 H			X					
CE2	D3-1 SEL 2 H			X					
BK2	D3-1 SEL 4 H			X					
CD1	D3-1 IN H			X					
CJ1	D3-1 OUT HIGH H			X					
CS1	D3-1 OUT LOW H			X					
EC1	D3-1 KA CRYSTAL CLOCK H			X					
AA1	D4-1 DB H		X	X	X	X	X	X	X
AC1	D4-1 D1 H		X	X	X	X	X	X	X
BJ1	D4-1 D2 H		X	X	X	X	X	X	X
BF2	D4-1 D3 H		X	X	X	X	X	X	X
CT2	D4-1 D4 H		X	X	X	X	X	X	X
BD2	D4-1 D5 H		X	X	X	X	X	X	X
AJ1	D4-1 D6 H		X	X	X	X	X	X	X
AB1	D4-1 D7 H		X	X	X	X	X	X	X
AE1	D4-2 D8 H		X	X	X	X	X	X	X
AD1	D4-2 D9 H		X	X	X	X	X	X	X
CR1	D4-2 D10 H		X	X	X	X	X	X	X
CP1	D4-2 D11 H		X	X	X	X	X	X	X
CP2	D4-2 D12 H		X	X	X	X	X	X	X
CN1	D4-2 D13 H		X	X	X	X	X	X	X
CN2	D4-2 D14 H		X	X	X	X	X	X	X
CM1	D4-2 D15 H		X	X	X	X	X	X	X
	D4-3 SEL (0/4) MUX AL		X	X	X	X	X	X	X
	D4-3 SEL (0/2) MUX B L		X	X	X	X	X	X	X
	D4-3 CSR/BRD → BUS 7-0 L		X	X	X	X	X	X	X
	D4-3 CSR/BRD → BUS 15-8 L		X	X	X	X	X	X	X
	D4-3 06 REG → BUS L		X	X	X	X	X	X	X
	D4-3 REG MUX A L		X	X	X	X	X	X	X
	D4-3 REG MUX B L		X	X	X	X	X	X	X
CH2	D4-3 AB MUX SEL H		X	X	X	X	X	X	X
EA1	D4-3 SERIAL CLOCK TRANSMIT EXT		X	X	X	X	X	X	X
	D4-3 CLR SYNC L		X	X	X	X	X	X	X
DS1	D4-3 SERIAL CLOCK EXTERNAL		X	X	X	X	X	X	X
DS2	D4-3 BCC 10-23 (1) H		X	X	X	X	X	X	X
DK1	D4-3 BITS 8 (1) H		X	X	X	X	X	X	X
DL2	D4-3 BITS 9 (1) H		X	X	X	X	X	X	X
DT2	D4-3 BITS 10 (1) H		X	X	X	X	X	X	X
DB1	D4-3 BITS 11 (1) H		X	X	X	X	X	X	X
DL1	D4-3 VRC (1) H		X	X	X	X	X	X	X
CV1	D4-3 UNDEFINED 2 H		X	X	X	X	X	X	X
	D4-3 STEP CK (1) H		X	X	X	X	X	X	X
	D4-3 STEP MODE (1) H		X	X	X	X	X	X	X
DV2	D4-3 TEST LOOP (1) H		X	X	X	X	X	X	X
	D4-3 SD H		X	X	X	X	X	X	X
ED1	D4-3 TX CLOCK H		X	X	X	X	X	X	X
FE2	D4-3 RX CLOCK H		X	X	X	X	X	X	X
FM2	D4-3 SERIAL DATA IN L		X	X	X	X	X	X	X
	D4-4 +3V		X	X	X	X	X	X	X
	D4-4 HD (1) H		X	X	X	X	X	X	X
DK2	D4-4 STRIP SYNC (1) H		X	X	X	X	X	X	X
	D4-4 ERR IE (1) H		X	X	X	X	X	X	X
	D4-4 RX DONE IE (1) H		X	X	X	X	X	X	X
	D4-4 CHAR IE (1) H		X	X	X	X	X	X	X
CU1	D4-4 CHAR INTR (1) H		X	X	X	X	X	X	X
	D4-4 RX/CHAR INTR L		X	X	X	X	X	X	X
	D4-4 RX P DONE (1) H		X	X	X	X	X	X	X
	D4-4 RX S DONE (1) H		X	X	X	X	X	X	X
ER2	D4-4 RX GO (1) H		X	X	X	X	X	X	X
CJ2	D4-4 LD RX 15-8 H		X	X	X	X	X	X	X
CE1	D4-4 LD TX 7-0 H		X	X	X	X	X	X	X
EP2	D4-4 IDLE MODE (1) H		X	X	X	X	X	X	X
	D4-4 TX DONE IE (1) H		X	X	X	X	X	X	X

REVISIONS		
CHK	CHANGE NO.	REV.

PIN	SIGNAL NAME	PAGE	D4-1	D4-2	D4-3	D4-4	D4-5	D4-6	D4-7
AV1	D4-4 TX ERR INTR L		X						
	D4-4 TX P DONE (1) H		X						
	D4-4 TX S DONE (1) H		X						
EN2	D4-4 TX GO (1) H		X						
FU1	D4-5 RD 15 H		X						
FR2	D4-5 RD 14 H		X						
FV1	D4-5 RD 13 H		X						
FN1	D4-5 RD 12 H		X						
FS2	D4-5 RD 11 H		X						
FV2	D4-5 RD 10 H		X						
FU2	D4-5 RD 9 H		X						
FJ1	D4-5 RD 8 H		X						
FS1	D4-5 RD 7 H		X						
FR1	D4-5 RD 6 H		X						
FT2	D4-5 RD 5 H		X						
	D4-5 RD 4 H		X						
	D4-5 +3V		X						
FH2	D4-5 RD 3 H		X						
FF2	D4-5 RD 2 H		X						
FJ2	D4-5 RD 1 H		X						
FK1	D4-5 RD 0 H		X						
FN2	D4-5 RX BCC DATA IN L		X						
	D4-5 BITS 11 L		X						
	D4-5 TB 15 H		X						
	D4-5 TB 14 H		X						
	D4-5 TB 13 H		X						
	D4-5 TB 12 H		X						
	D4-5 TB 11 H		X						
	D4-5 TB 10 H		X						
	D4-5 TB 9 H		X						
	D4-5 TB 8 H		X						
	D4-5 TB 7 H		X						
	D4-5 TB 6 H		X						
	D4-5 TB 5 H		X						
	D4-5 TB 4 H		X						
	D4-5 TB 3 H		X						
	D4-5 TB 2 H		X						
	D4-5 TB 1 H		X						
	D4-5 TB 0 H		X						
BN2	D4-5 TD 15 H		X						
CV2	D4-5 TD 14 H		X						
BP1	D4-5 TD 13 H		X						
BR1	D4-5 TD 12 H		X						
BT2	D4-5 TD 11 H		X						
BS2	D4-5 TD 10 H		X						
BH1	D4-5 TD 9 H		X						
BR2	D4-5 TD 8 H		X						
BH2	D4-5 TD 7 H		X						
BK1	D4-5 TD 6 H		X						
BV2	D4-5 TD 5 H		X						
BU1	D4-5 TD 4 H		X						
BV1	D4-5 TD 3 H		X						
BS1	D4-5 TD 2 H		X						
BU2	D4-5 TD 1 H		X						
BP2	D4-5 TD 0 H		X						
	D4-5 TX DATA 15-8 L		X						
	D4-5 TX DATA 7-0 L		X						
	D4-6 TX CK LOSS (1) H		X						
	D4-6 TX LATE (1) H		X						
	D4-6 TX NON MEM (1) H		X						
	D4-6 RX CK LOSS (1) H		X						
	D4-6 TX ERR L		X						
	D4-6 RX ERR L		X						
	D4-6 RX LATE (1) H		X						
	D4-6 RX NON MEM (1) H		X						
	D4-6 RX BCC ERR (1) H		X						
	D4-6 RX VRC ERR (1) H		X						
FB1	D4-6 REG PT 8 (1) H		X						
FC1	D4-6 REG PT 9 (1) H		X						
EN1	D4-6 REG PT 10 (1) H		X						
EP1	D4-6 REG PT 11 (1) H		X						
AU1	D4-6 EE 13 (1) H		X						
AE2	D4-6 EE 14 (1) H		X						
	D4-6 ERR INTR H		X						
	D4-7 S15 (1) H		X						
	D4-7 S14 (1) H		X						
	D4-7 S13 (1) H		X						
	D4-7 S12 (1) H		X						
	D4-7 S11 (1) H		X						
	D4-7 S10 (1) H		X						
	D4-7 S9 (1) H		X						
	D4-7 S8 (1) H		X						
	D4-7 S7 (1) H		X						
	D4-7 S6 (1) H		X						
	D4-7 S5 (1) H		X						
	D4-7 S4 (1) H		X						
	D4-7 S3 (1) H		X						
	D4-7 S2 (1) H		X						
	D4-7 S1 (1) H		X						
	D4-7 S0 (1) H		X						
ER1	D4-7 SERIAL DATA OUT L		X						
BL2	D4-7 TX DATA H		X						
FE1	D4-7 RX SYNC DET H		X						
	D4-7 BRD 15 H		X						

D4-7	BRD	14	H		
D4-7	BRD	13	H		
D4-7	BRD	12	H		
D4-7	BRD	11	H		
D4-7	BRD	10	H		
D4-7	BRD	9	H		
D4-7	BRD	8	H		
D4-7	BRD	7	H		
D4-7	BRD	6	H		
D4-7	BRD	5	H		
D4-7	BRD	4	H		
D4-7	BRD	3	H		
D4-7	BRD	2	H		
D4-7	BRD	1	H		
D4-7	BRD	0	H		
D5-1	CC/BA	0	H		
D5-1	CC/BA	1	H		
D5-1	CC/BA	2	H		
D5-1	CC/BA	3	H		
D5-1	CC/BA	4	H		
D5-1	CC/BA	5	H		
D5-1	CC/BA	6	H		
D5-1	CC/BA	7	H		
D5-2	CC/BA	8	H		
D5-2	CC/BA	9	H		
D5-2	CC/BA	10	H		
D5-2	CC/BA	11	H		
D5-2	CC/BA	12	H		
D5-2	CC/BA	13	H		
D5-2	CC/BA	14	H		
D5-2	SP	PORT	13	H	
D5-2	SP	PORT	14	H	
D5-2	CD	BA	15	H	
D6-2	LD	TX	BUF	(1) L	
D5-3	TX	CYCLE	H		
D5-3	RX	CYCLE	H		
D5-3	RX	NPR	L		
D5-4	LD	MISC	L		
D5-4	TX	S	(1) H		
D5-4	TX	S	(1) H		
D5-4	LD	PTEE	H		
D5-4	LD	ERR	H		
D5-4	1	RX	CK	LOSS	L
D5-4	1	TX	CK	LOSS	L
D5-4	CK	LOSS	SH	CNTL	H
D5-4	INI	H			
D5-4	1	RX	P	DONE	L
D5-4	1	RX	S	DONE	L
D5-4	0	RX	GO	L	
D5-4	1	TX	P	DONE	L
D5-4	1	TX	S	DONE	L
D5-4	0	TX	GO	L	
D5-4	LD	SYNC	L		
D5-6	TX	ACTIVE	(1)	H	
D5-6	TX	ACTIVE	(1)	H	
D5-6	TX	ACTIVE	(1)	H	
D5-6	TX	BIT	CNTR	1	(T)
D5-6	TX	BIT	CNTR	2	(1)
D5-6	TX	BIT	CNTR	4	(1)
D5-6	VRC	TX	ACTIVE	L	
D5-6	TX	SYNC	EN	15-8	L
D5-6	TX	SYNC	EN	7-0	L
D5-6	TX	DATA	EN	7-0	L
D5-6	TX	DATA	EN	15-8	L
D5-6	TX	TX	SL	REG	H
D5-6	TX	TX	SL	REG	H
D5-7	RX	ACTIVE	(1)	H	
D5-7	CLR	RX	L		
D5-7	LD	RX	BUF	15-8	L
D5-7	VRC	ERR	DET	L	
D5-7	SYNC	2	(1)	H	
D5-7	SYNC	1	(1)	H	
D5-8	RX	LATE	L		
D5-8	LD	RX	BUF	7-0	L
D5-1	CD	8	H		
D5-1	CD	9	H		
D5-1	CD	10	H		
D5-1	CD	11	H		
D5-1	1	CHAR	INTR	L	
D5-2	TIME	OUT	H		
D5-2	LD	TX	BUF	(1)	L
D5-4	BCC	/DLE	L		
D5-6	BCC	ERR	L		
D5-6	RX	BCC	CYCLE	L	

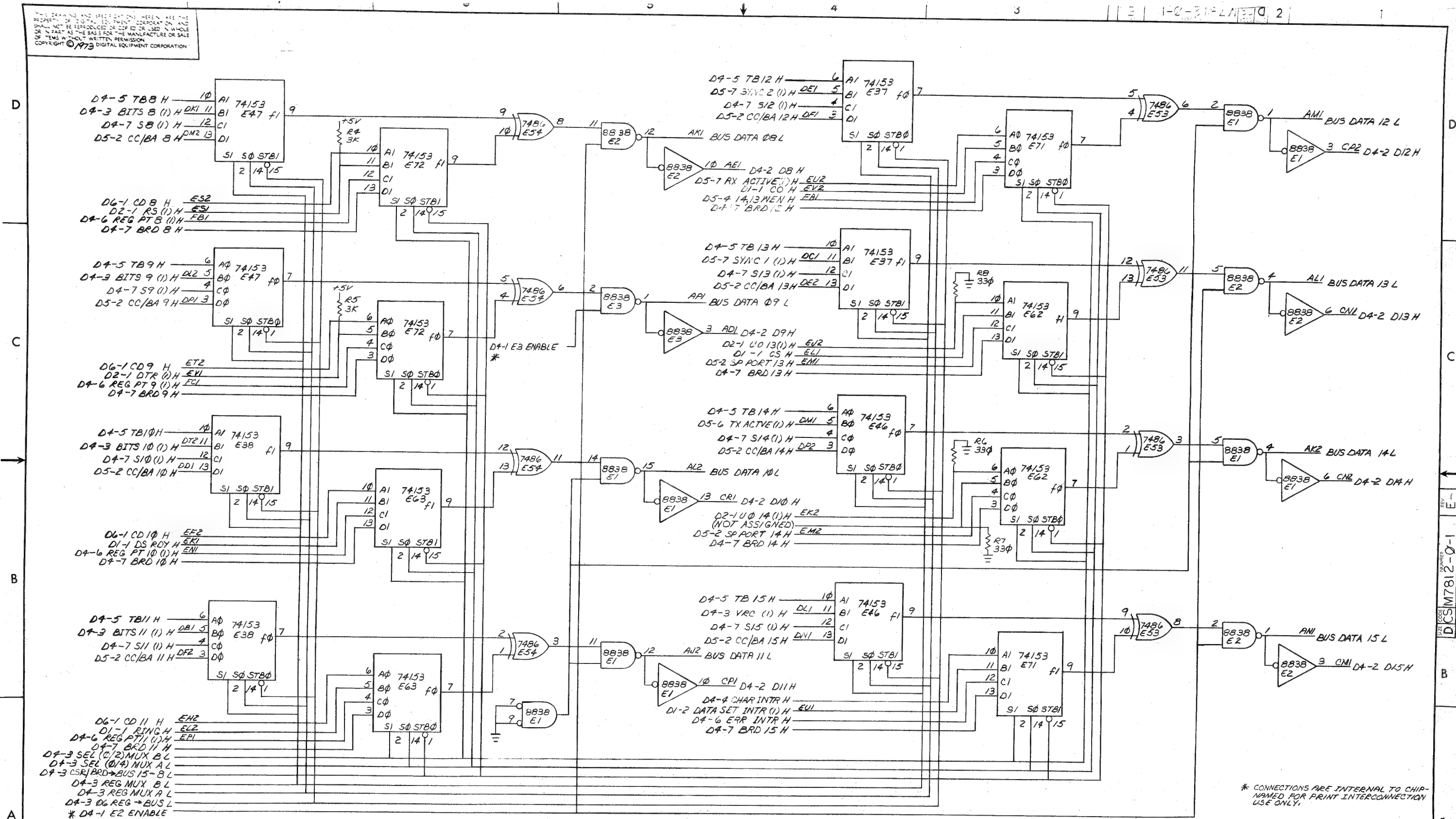
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REVISIONS		
CHK	CHANGE NO.	REV.

(BUS SELECTORS 7-Ø)

TITLE		RUS SELECTORS (SR		SIZE	CODE	NUMBER		REV.
E SH REG		(D4-1)		D	CS	M7E12-0-1		E
SCALE	1/2" = 1'	SHEET	3	OF	9	DIST.		



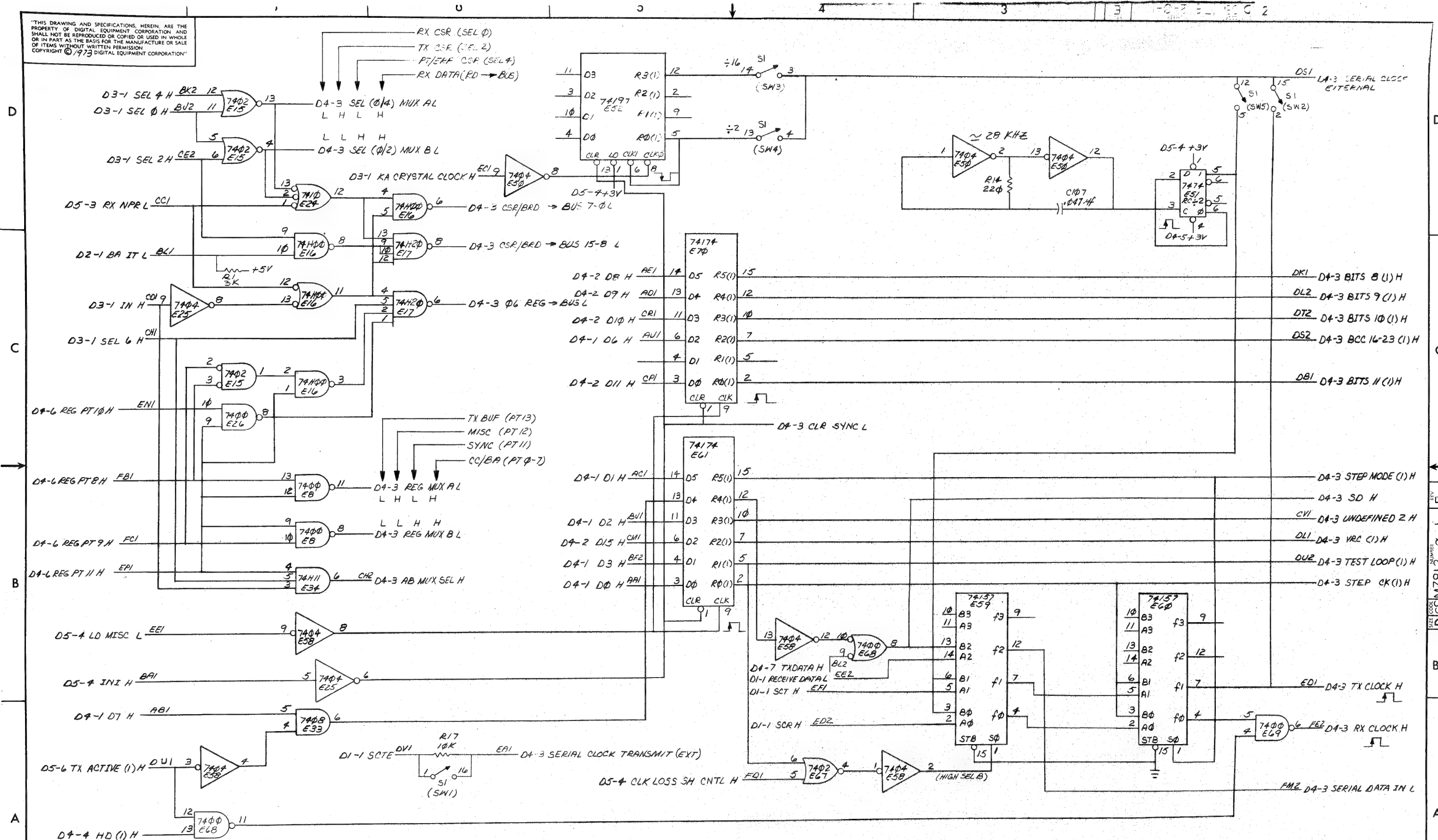
* CONNECTIONS ARE INTERNAL TO CHIP-NAMED FOR PRINT INTERCONNECTION USE ONLY.

REVISIONS		
CHK	CHANGE NO.	REV.

(BUS SELECTORS 15-8)

TITLE		SIZE CODE	NUMBER	REV.
BUS SELECTORS CSR		D	CSM7812-0-1	E
SHEET 4 OF 9				

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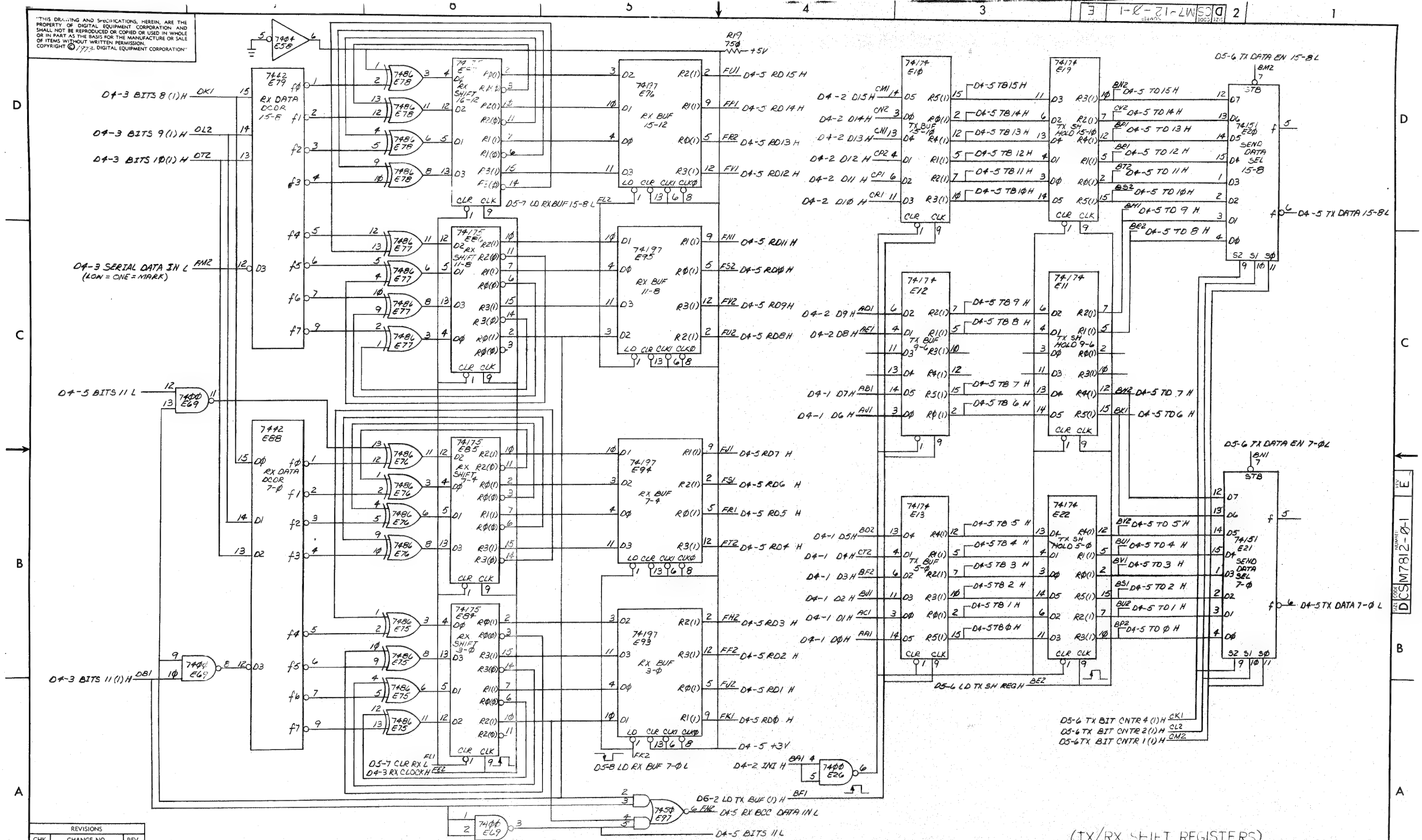
REVISIONS		
CHK	CHANGE NO.	REV.

(AA SEL DCDR & MISC CSR)		TITLE		SIZE CODE	NUMBER	REV.
BUS SELECTORS CSR		D4-3		DCSM7812-0-1	E	
1 SH REG		SCALE 1/16"		SHEET 5	OF 9	



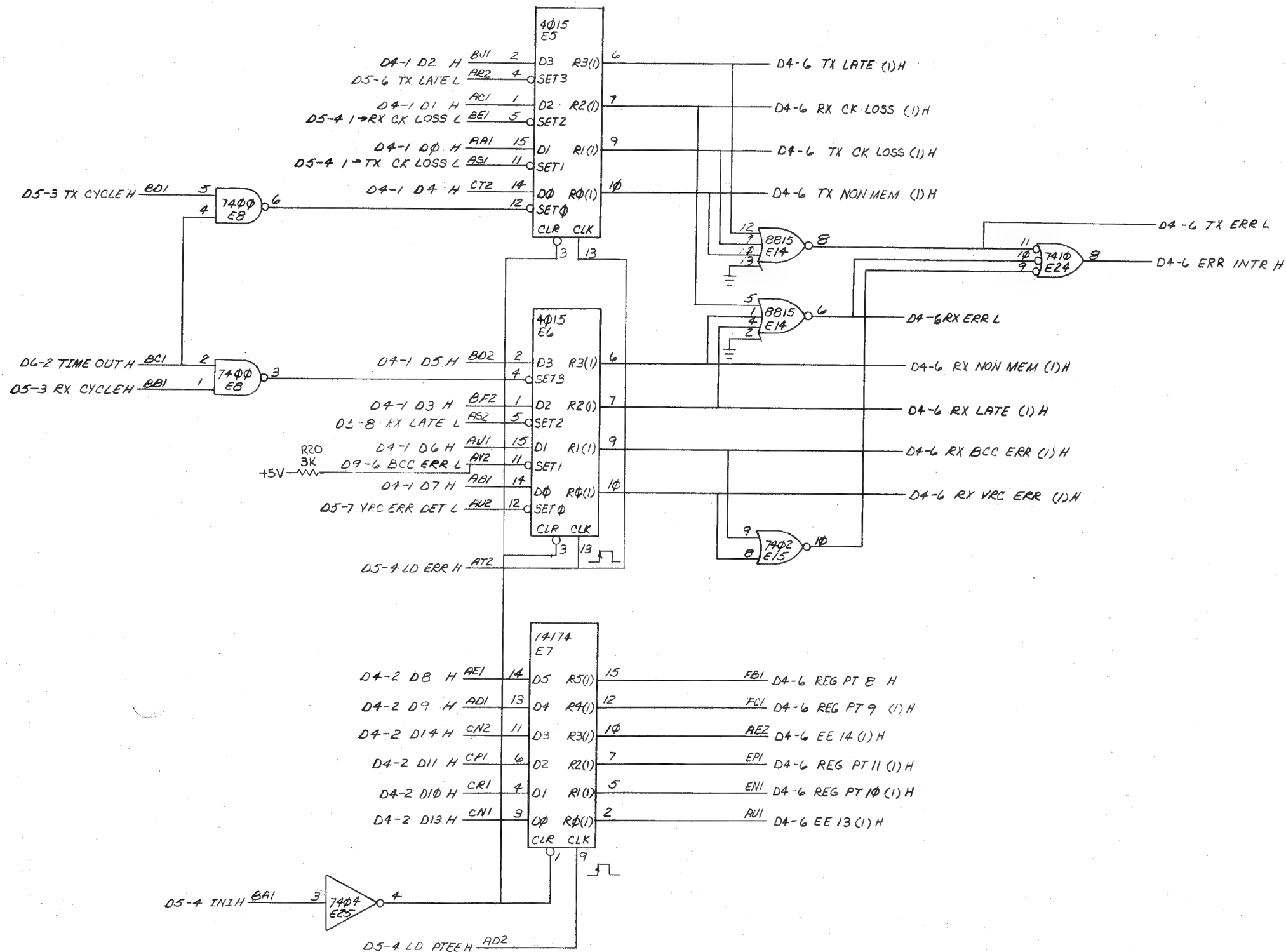
(TX/RX CSR)									
TITLE BUS SELECTORS CSR				SIZE CODE		NUMBER		REV.	
1 SH REG (F + 4)				D CS		M7812-0-1		E	
SCALE NONE			SHEET 6 OF 9		DIST.				

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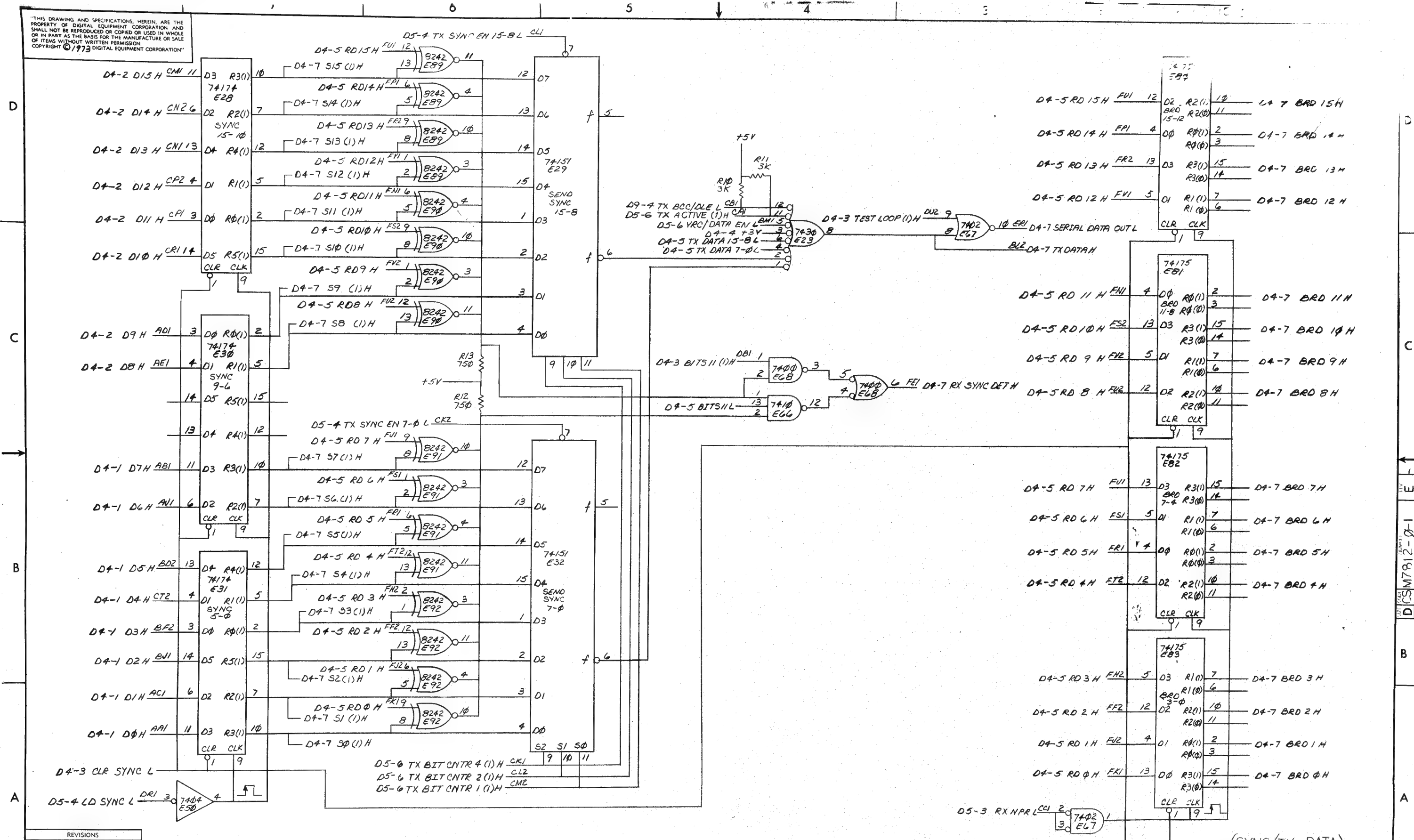
REVISIONS		
CHK	CHANGE NO.	REV.

TITLE		SIZE CODE	NUMBER	REV.
BUS SELECTORS CSR		D	CSM7812-0-1	E
A SH REG				
SCALE 1/16"		SHEET 7	OF 9	



REVISIONS		
CHK	CHANGE NO.	REV.

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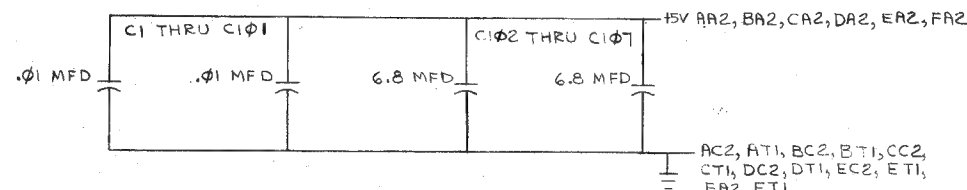
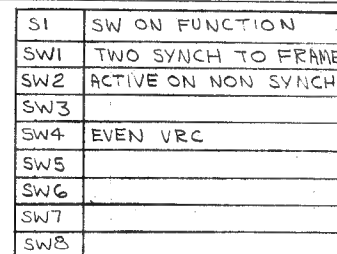


REVISIONS		
CHK	CHANGE NO.	REV.

TITLE BUS SELECTORS CSR		SIZE CODE	NUMBER	REV.
E SH		D	CSM7812-0-1	E
SHEET 7 OF 9		DIST.		


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1. UNLESS OTHERWISE NOTED ALL RESISTANCE IS IN OHMS.
2. ALL SPARES ARE ON SHEET #7.



CHK	CHANGE NO.	REV
	ORIGINAL	B
	M7813-00001	C
	R. Lisee	
	M7813-00002	D
	R. Lisee	
	M7813-00003	E
	R. Lisee	
	M7813-00004	F
	R. Lisee	
	M7813-00005	H
	R. Lisee	
	M7813-00006	J
	R. Lisee	

REF		X-Y COORDINATE HOLE LOCATION	K-CO-M7813-0-4	1
REF		ASSY DRILLING HOLE LAYOUT	D-AH-M7813-0-5	2
REF		MODULE ECO HISTORY	B-MH-M7813-0-6	3
1		ETCHED CIRCUIT BOARD	5010532	4
1	C112	CAP 10 MMF 100V 5% DM	1000006	5
1	C114	CAP 330 MMF 100V 5% DM	1000023	6
101	C1-C101	CAP .01 MFD 50V 20% AX CER	1001610	7
1	C115	CAP 1500 MMF 100V 5% DM	1002428	8
2	C108,C116	CAP 3.3 UJF 20V 10% TANT	1005334	9
6	C102-C107	CAP 6.8 MFD 35V 10% TANT	1005306	10
1	E89	SOCKET I.C.	1209838	11
1	S1	DUAL IN-LINE SWITCH(8 POSITION)	1211164-4	12
3	R4 R44,R53	RES 220 OHMS 1/4W 5%	1300271	13
20	R1,R2,R6,R7,R9,R10-R24	RES 470 OHMS 1/4W 5%	1300316	14
18	R26,R27,R30,R31,R33,R34,R54,R37 R38,R39,R41,R42,R43,R67,R50,R34,R55,R58	RES 3K 1/4W 5%	1300432	15
2	R52,R56	RES 15K 1/4W 5%	1300496	16
10	R5,R8,R32,R35,R46,R47,R51,R49 R55,R36	RES 5.6K 1/4W 5%	1301874	17
2	R28,R29	RES 18K 1/4W 5%	1302465	18
18	E14,24,29,49,58,59,63,67,68,72, 73,77,78, ,87,91,92,100,101	I.C. DEC 7474	1905547	19
7	E20,39,62,65,75,85,98	I.C. DEC 7400	1905575	20
3	E45,61,88	I.C. DEC 7410	1905576	21
2	E80,83	I.C. DEC 7420	1905577	22
5	E48,57,51,52,90	I.C. DEC 7450	1905580	23
4	E30,35,56,82	I.C. DEC 7402	1909004	24
1	E9	I.C. DEC 7400	1909056	25
2	E8,38	I.C. DEC 7400	1909080	26
3	E3,19,34	I.C. DEC 74174	1909867	27
8	E4,40,70,74,94,95	I.C. DEC 7404	1909886	28
5	E1,11,21,31,41	I.C. DEC 6881	1909705	29
3	E18,23,28	I.C. DEC 7416	1909828	30
2	E13,15	I.C. DEC 74004	1909931	31
1	E84	I.C. DEC 7486	1910811	32
1	E44	I.C. DEC 7442	1910846	33
8	E5,33,50,54,66,79,96,99	I.C. DEC 7408	1910155	34
7	E10,55,64,69,93,97,102	I.C. DEC 74123	1910436	35
7	E7,17,27,37,43,47,76	I.C. DEC 74S198	1910549	36
8	E2,12,22,32,42,80,81,86	I.C. DEC 74161	1910650	37
1	E71	I.C. DEC 74175	1910851	38
5	E6,16,26,36,46	I.C. DEC 3101	1910863	39
1	E25	I.C. DEC 7427	1910878	40
1	E53	I.C. DEC 8837	1911116	41
12		EYELET #GS4-7 STIMPSON	9006732	42
1	HANDLE, MODULE		1210711-2	43
1	C111	CAP 27MMF 100V 5 DM	1001739	44
1	C109	CAP 1200PF 100V 5% DM	1002424	45

QTY	REF DESIGNATION	DESCRIPTION	PART NO.	ITEM NO.
PARTS LIST				
ETCH BOARD REV	F			
		DRN. <i>K. Wall</i>	DATE <i>7-11-73</i>	 DIGITAL EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS
		CHK'D. <i>Chief Clerk</i>	DATE <i>11/5/72</i>	
		ENG. <i>W. Wall</i>	DATE <i>11/5/72</i>	
		PROJ. ENG. <i>W. Wall</i>	DATE <i>11/5/72</i>	
		PROD. <i>K. Wall</i>	DATE <i>11/8/73</i>	
		NEXT HIGHER ASSY B-DD-DQ11-0		
DEC NO.	EIA NO.	SIZE CODE		NUMBER
CONVERSION CHART		DCS M7813-0-1		REV. K
		SCALE <i>1/4" = 1"</i>	DIST.	
		SHEET 1	OF 10	

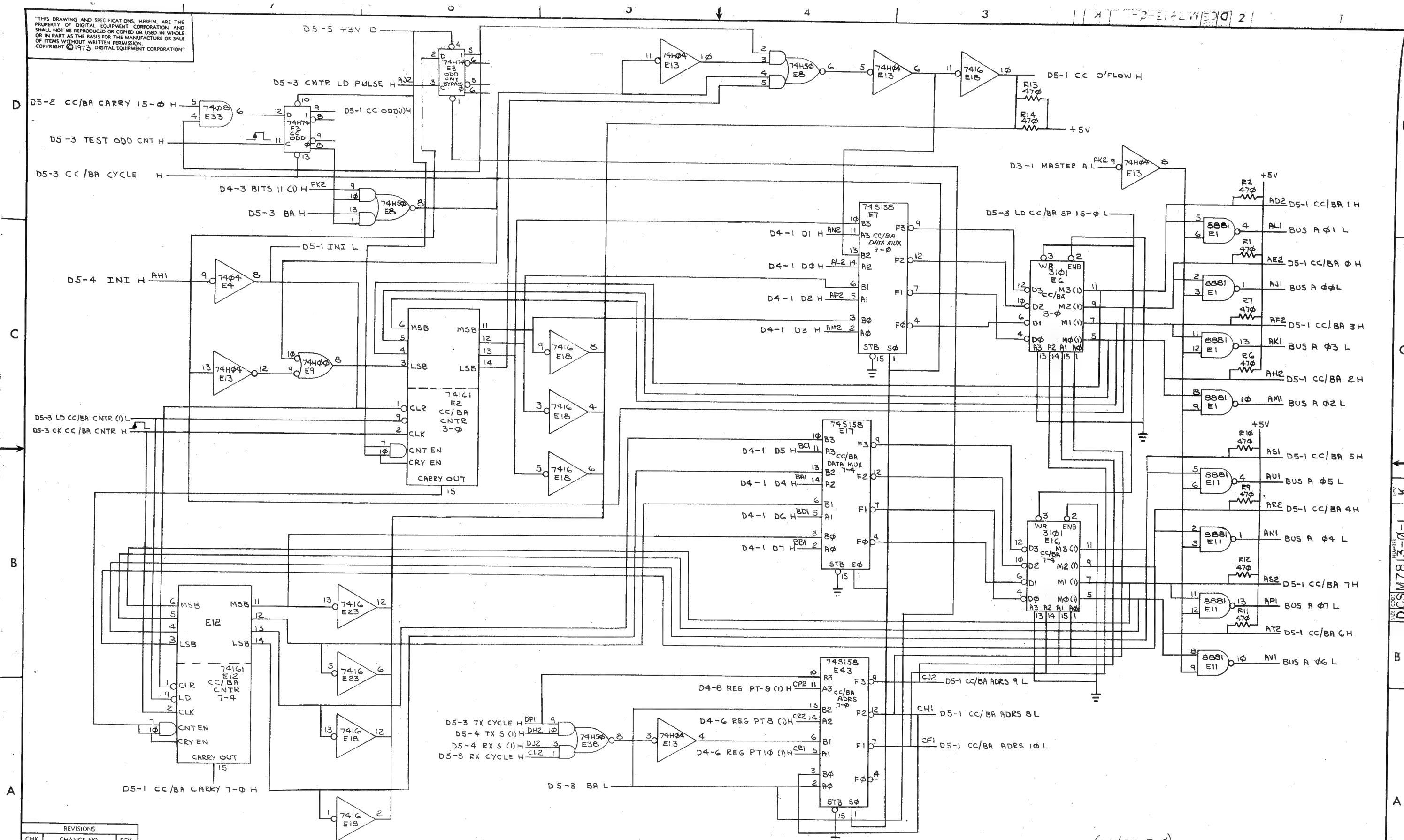
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PIN	SIGNAL NAME	PAGE	3	4	5	6	7	8	9	10
AJ1	BUS A00 L		X							
AL1	BUS A01 L		X							
AM1	BUS A02 L		X							
AK1	BUS A03 L		X							
AN1	BUS A04 L		X							
AU1	BUS A05 L		X							
AV1	BUS A06 L		X							
AP1	BUS A07 L		X							
BF1	BUS A08 L			X						
BJ1	BUS A09 L			X						
BK1	BUS A10 L			X						
BH1	BUS A11 L			X						
BN1	BUS A12 L			X						
BS1	BUS A13 L			X						
BR1	BUS A14 L			X						
BP1	BUS A15 L			X						
CH2	BUS A16 L			X						
CC1	BUS A17 L			X						
CK2	BUS C1 L				X					
DL1	BUS SSYN L					X				
DE1	BUS INIT L					X				
FH1	BUS BG IN H						X			
FF1	BUS BG OUT H						X			
FE1	BUS BG 4 IN H						X			
FE2	BUS BG 5 OUT H						X			
FD1	BUS BG 6 IN H						X			
FC1	BUS BG 7 OUT H						X			
FB1	BUS BG 7 IN H						X			
FA1	BUS BR L						X			
EV1	BUS BR 4 L						X			
EU1	BUS BR 5 L						X			
EV2	BUS BR 6 L						X			
EU2	BUS BR 7 L						X			
DR2	D2-1 DS INTR L			X	X	X				
AK2	D3-1 MASTER A L						X			
CM1	D3-1 OUT HIGH H						X			
CV2	D3-1 SEL 4 H						X			
CU1	D3-1 OUT LOW H						X			
BS2	D3-1 SEL 6 H						X			
DN2	D3-1 INTR B DONE H						X			
AL2	D4-1 DM H							X		
AN2	D4-1 D1 H								X	
AP2	D4-1 D2 H									X
AM2	D4-1 D3 H									X
BA1	D4-1 D4 H									X
BC1	D4-1 D5 H									X
BD1	D4-1 D6 H									X
BB1	D4-1 D7 H									X
BM1	D4-2 D8 H									X
BP2	D4-2 D9 H									X
BR2	D4-2 D10 H									X
BN2	D4-2 D11 H									X
CB1	D4-2 D12 H									X
CE2	D4-2 D13 H									X
CF2	D4-2 D14 H									X
CD2	D4-2 D15 H									X
EP2	D4-3 BITS 8 (1) H							X	X	
EN2	D4-3 BITS 9 (1) H							X	X	
EM2	D4-3 BITS 10 (1) H							X	X	
EL2/FH2	D4-3 BITS 11 (1) H							X	X	
EM1	D4-3 TX CLOCK H							X	X	
ES1	D4-3 RX CLOCK H							X	X	
DA1	D4-3 TEST LOOP (1) H							X	X	
DF1	D4-3 VRC (1) H							X	X	
EH2	D4-3 SERIAL DATA IN L							X	X	
FM2	D4-4 LD RX 15-8 H							X	X	
AD1	D4-4 TX GD (1) H							X	X	
FM1	D4-4 RX GD (1) H							X	X	
DN1	D4-4 TX/ERR INTR L							X	X	
AE1	D4-4 RX/CHAR INTR L							X	X	
DS2	D4-4 IDLE MODE (1) H							X	X	
FN1	D4-4 STRIP SYNC (1) H							X	X	
EP1	D4-6 RX SYNC DET H							X	X	
CR2	D4-6 REG PT 8 (1) H							X	X	
CP2	D4-6 REG PT 9 (1) H							X	X	
CR1	D4-6 REG PT 10 (1) H							X	X	
BL2	D4-6 REG PT 11 (1) H							X	X	
CN2	D4-6 EE 13 (1) H							X	X	
CN1	D4-6 EE 14 (1) H							X	X	
FR2	D4-7 TX DATA H							X	X	
	D5-1 CC ODD (1) H							X	X	
	D5-1 INT L							X	X	
	D5-1 CC/BA CARRY 7-8 H							X	X	
	D5-1 CC D' FLOW H							X	X	
CH1	D5-1 CC/BA ADPS 8 L							X	X	
CJ2	D5-1 CC/BA ADPS 9 L							X	X	
CF1	D5-1 CC/BA ADPS 10 L							X	X	
AE2	D5-1 CC/BA 0 H							X	X	
AD2	D5-1 CC/BA 1 H							X	X	
AH2	D5-1 CC/BA 2 H							X	X	
AF2	D5-1 CC/BA 3 H							X	X	

PIN	SIGNAL NAME	PAGE	3	4	5	6	7	8	9	10
AR2	D5-1 CC/BA 4 H									
AS1	D5-1 CC/BA 5 H									
AT2	D5-1 CC/BA 6 H									
AS2	D5-1 CC/BA 7 H									
BF2	D5-2 CC/BA 8 H									
BE2	D5-2 CC/BA 9 H									
BJ2	D5-2 CC/BA 10 H									
BH2	D5-2 CC/BA 11 H									
BU2	D5-2 CC/BA 12 H									
BT2	D5-2 CC/BA 13 H									
BU1	D5-2 CC/BA 14 H									
BV2	D5-2 CC/BA 15 H									
CE1	D5-2 DI PORT 14 L									
CM1	D5-2 SP PORT 13 H									
CJ1	D5-2 SP PORT 14 H									
	D5-2 CC/BA CARRY 15-8 H									
	D5-3 LD CC/BA CNTR (1) L									
ARI	D5-3 TEST NEXT CC (1) H									
AV2	D5-3 NPP RQ H									
AU2	D5-3 NPP EN (1) H									
DP1	D5-3 TX TXP DONE H									
CL2	D5-3 TX NPP DONE H									
	D5-3 RX CYCLE H									
AF1	D5-3 RX NPP L									
	D5-3 CK CC/BA CNTR H									
CD1	D5-3 INH SEL L									
	D5-3 CC/BA CYCLE H									
	D5-3 BA L									
AJ2	D5-3 CNTR LD PULSE H									
	D5-3 TEST ODD CNT H									
	D5-3 LD CC/BA SP 15-8 L									
CM2	D5-3 LD SP PORT L									
	D5-3 NEXT CC PULSE H									
CU2	D5-4 LD PTEE H									
CV1	D5-4 LD ERP H									
CP1	D5-4 LD SYNC L									
DJ1	D5-4 LD MISC L									
CA1	D5-4 SEL 6 LD L									
	D5-4 LD CC/BA L									
CT2	D5-4 WEN (1) H									
	D5-4 LD EXT/TRANS H									
AC1	D5-4 I-TX CK LOSS L									
DM1	D5-4 CLOCK LOSS SH CNTR (1) H									
BV1	D5-4 I-RX CK LOSS L									
CS2	D5-4 I-TX GO L									
DM2	D5-4 I-TXS DONE L									
DH2	D5-4 TXS (1) H									
DF2	D5-4 I-TX P DONE L									
DJ2	D5-4 RX S (1) H									
DD1	D5-4 I-RX P DONE L									
DC1	D5-4 I-RX S DONE L									
CS1	D5-4 I-RX GO L									
AH1	D5-4 INI H									
	D5-4 INI L									
DL2	D5-4 BSSYN H									
BD2	D5-5 INH INTR "B" L									
BE1	D5-5 VECTOR BIT 2 (1) H									
EA1	D5-5 INTR B H									
	D5-5 +3A									
	D5-5 +3B									
	D5-5 +3C									
	D5-5 +3D									
	D5-5 +3E									
DV2	D5-6 B TXC L									
EB1	D5-6 TX FAKE END (1) H									
EH1	D5-6 TX ACTIVE (1) H									
	D5-6 INI L									
ED2	D5-6 DLE EN (1) L									
EC1	D5-6 BCC EN (1) L									
ED1	D5-6 TX SYNC EN 15-8 L									
EE2	D5-6 TX SYNC EN 7-8 L									
EF1	D5-6 DATA EN 15-8 L									
EF2	D5-6 DATA EN 7-8 L									
DV1	D5-6 SYNC EN L									
OK1	D5-6 VRC/DATA SEL L									
EK1	D5-6 TX BIT CNTR 0 (1) H									
EJ2	D5-6 TX BIT CNTR 4 (1) H									
EJ1	D5-6 TX BIT CNTR 2 (1) H									
ER2	D5-6 TX BIT CNTR 1 (1) H									
FJ1	D5-6 I-TX SEARCH RQ H									
ER1	D5-6 TX LATE L									
	D5-6 TX NPP RQ (1) L									
DS1	D5-6 LD TX SH REG H									
DK2	D5-7 LD RX BUF 15-8 L									
	D5-7 RX TRANSFER PULSE H									
FJ2	D5-7 TEST JUMPER MATCH L									
EK2	D5-7 SYNC 1 (1) H									
ET2	D5-7 SYNC 2 (1) H									
DH1	D5-7 RX ACTIVE (1) H									
EL1	D5-7 LD RX BIT CNTR L									
FU1	D5-7 LD MISC H									
	D5-7 CLR RX CNTR L									
	D5-7 CLR RX L									
CLI	D5-7 LD BUF L									
	D5-6 SYNC/DATA EN L									
	D5-7 RX ACTIVE (1) L									

PIN	SIGNAL NAME	PAGE	3	4	5	6	7	8	9	10
FS1	D5-7 VRC ERP DET L									
FK1	D5-7 B RX C L									
	D5-7 EVEN VRC L									
AA1	D5-8 LD RX BUF 7-8 L									
FR1	D5-8 RX CC ODD L									
	D5-8 CRA DLY L									
FU2	D5-8 RX LATE L									
	D5-8 RX NPP RQ (1) L									
BK2	D6-2 END NPP CYCLE (1) L									
FP2	D8-3 RX SEARCH DONE L									
FS2	D8-4 CRA L									
FT2	D8-4 STRIP DBL CHAR L									

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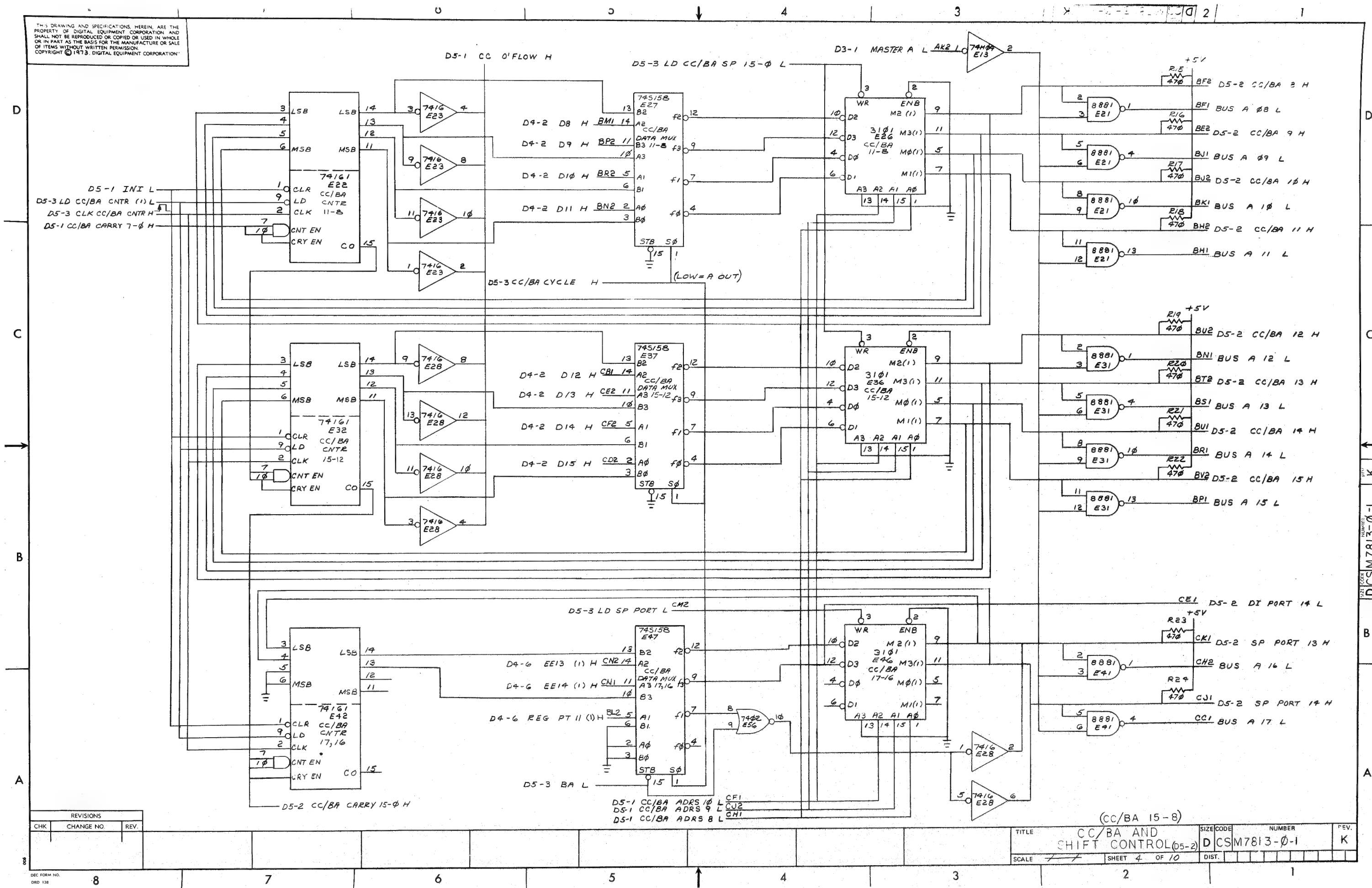
REVISIONS		
CHK	CHANGE NO.	REV.

DEC FORM N
DRD 138

(CC/BA 7-Ø)

TITLE		CC/BA AND SHIFT CONTROL (05-1)		SIZE	CODE	NUMBER		REVISION	
				D	CS	M7813-0-1			
SCALE	1/1	SHEET	3	OF	10	DIST.			

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D6-2 END NPR CYCLE (1) L

1-0-212211-5 C 2

D5-3 NPR RQ H
AV2

D5-7 RX NPR RQ (1) L
D5-6 TX NPR RQ (1) L

D5-3 LD CC/BA CNTR (1) L

D3-1 MASTER A L AK2

AU2 D5-3 NPR EN (1) H
D5-3 RX NPR DONE H

DP1 D5-3 TX CYCLE H
D5-3 TX NPR DONE H

CL2 D5-3 RX CYCLE H

D5-3 BA H
D5-3 RX NPR L

BUS CI L

D5-3 CK CC/BA CNTR H

+5V
R5 5.6K
C112 10PF
74H04 E15
74H04 E13
74H04 E10
74H04 E12
74H04 E11
74H04 E14
74H04 E16
74H04 E17
74H04 E18
74H04 E19
74H04 E20
74H04 E21
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74H04 E98
74H04 E99
74H04 E100

+5
R58 3K
TP BM2

+5V
R8 5.6K
C111 27PF
74H04 E10
74H04 E12
74H04 E11
74H04 E13
74H04 E14
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74H04 E97
74H04 E98
74H04 E99
74H04 E100

D5-5 +3V D 8881 E41
CD1 D5-3 INH SEL L

D5-3 CC/BA CYCLE H

D5-3 BA L
D5-3 CNTR LD PULSE H (CC)

D5-3 TEST ODD CNT H

D5-3 LD CC/BA SP 15 L
CM2 D5-3 LD SP PORT L

D5-2 NEXT CC PULSE H

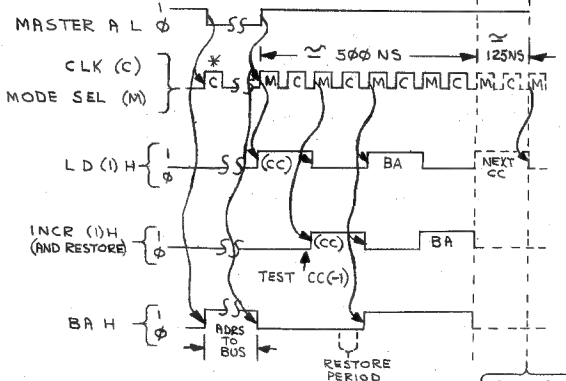
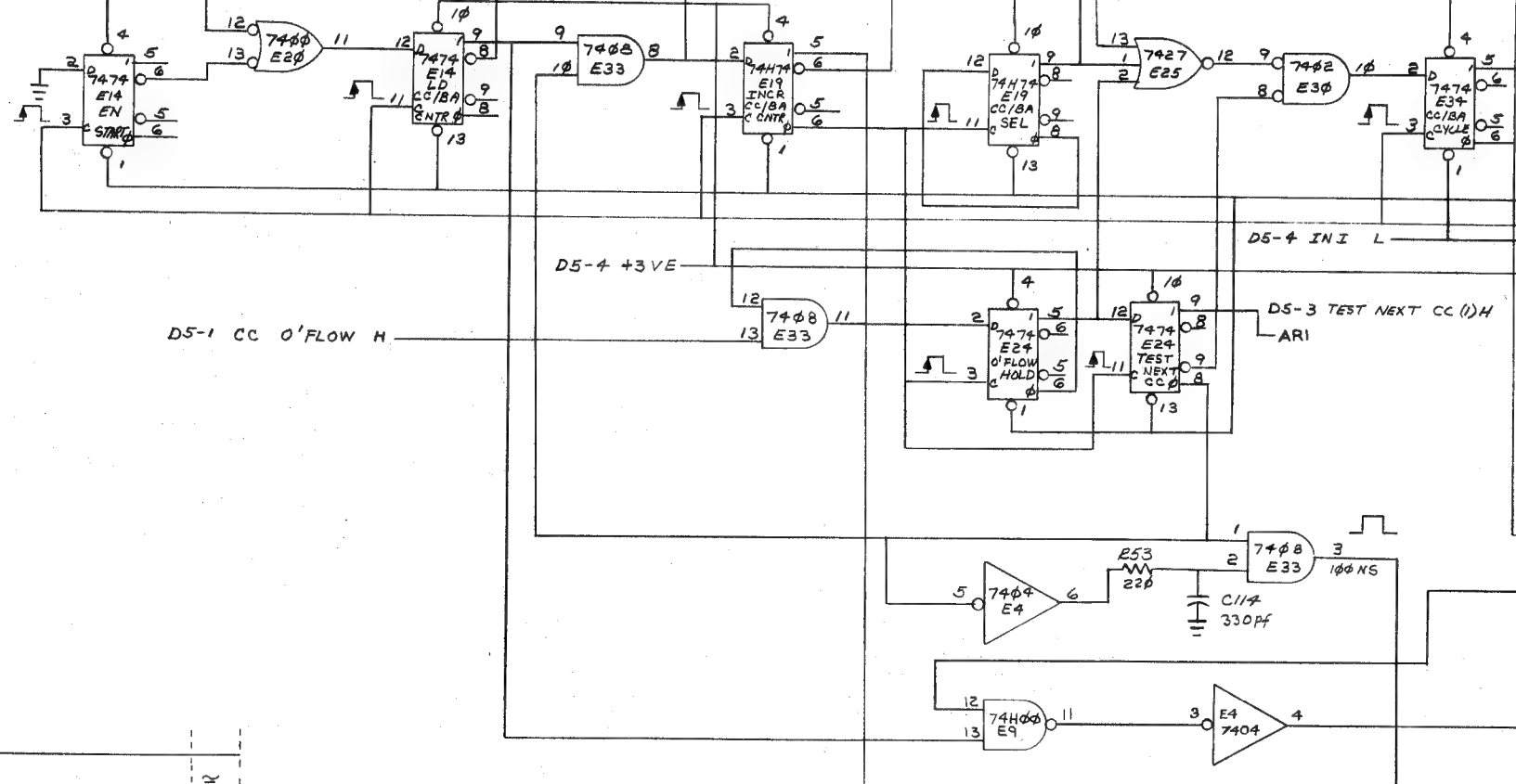
D5-4 LD EXT/TRANS H
D5-4 LD CC/BA L

D5-1 CC O'FLOW H

D5-4 +3VE

D5-4 INI L

D5-3 TEST NEXT CC (1) H
ARI



LEGEND:
* DOES NOTHING
-SS- IMPLIES BUS RESPONSE
--- IF O'FLOW

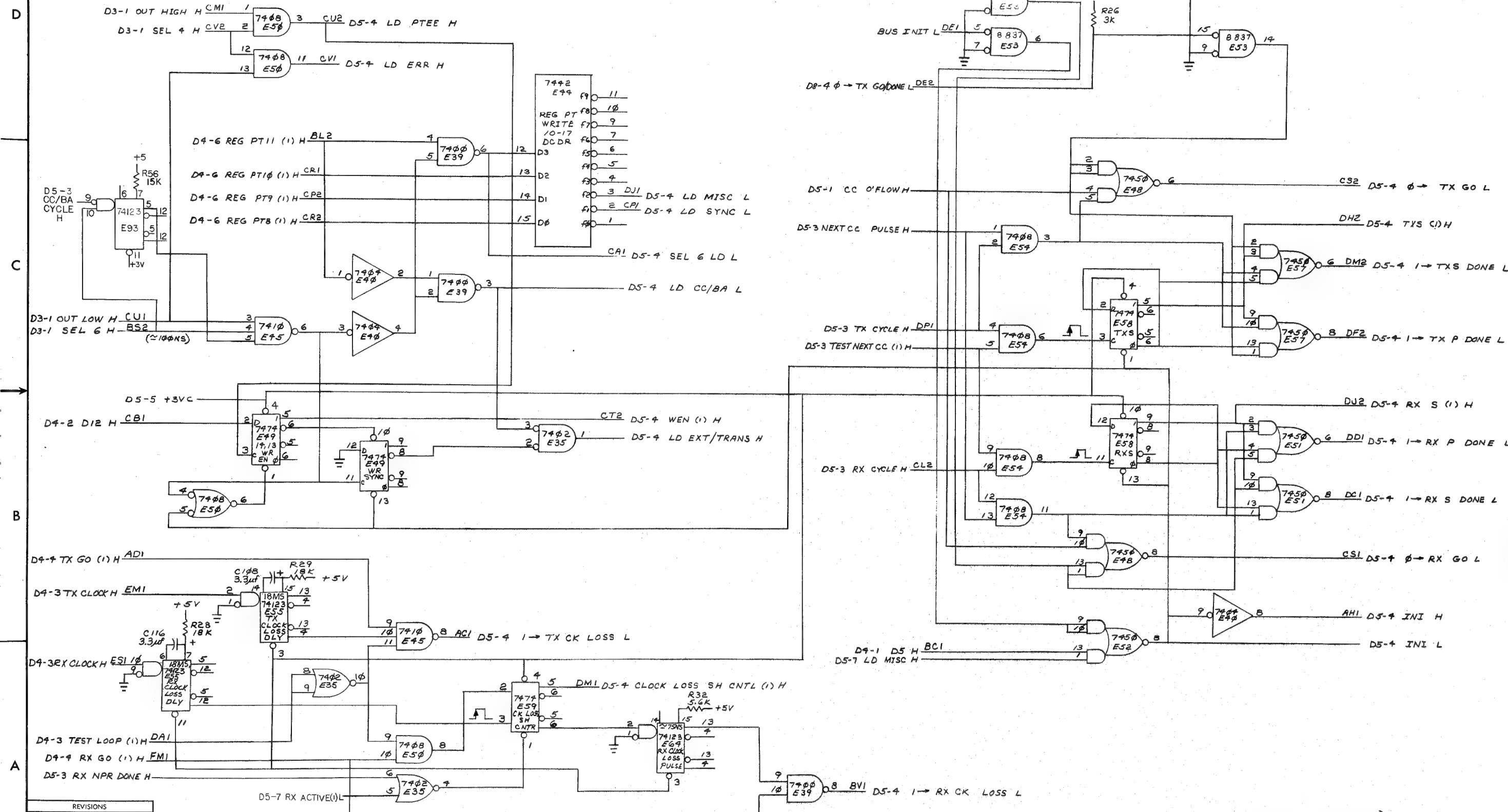
REVISIONS		
CHK	CHANGE NO.	REV.

TITLE				SIZE CODE		NUMBER		REV.	
CC/BA CONTROL				D		CSM7813-0-1		K	
SHIFT CONTROL (D5-3)				D		CSM7813-0-1		K	
SCALE				SHEET 5 OF 10		DIST.			

REV K
NUMBER DCSM7813-0-1
SIZE CODE

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DCS M7813-0-1

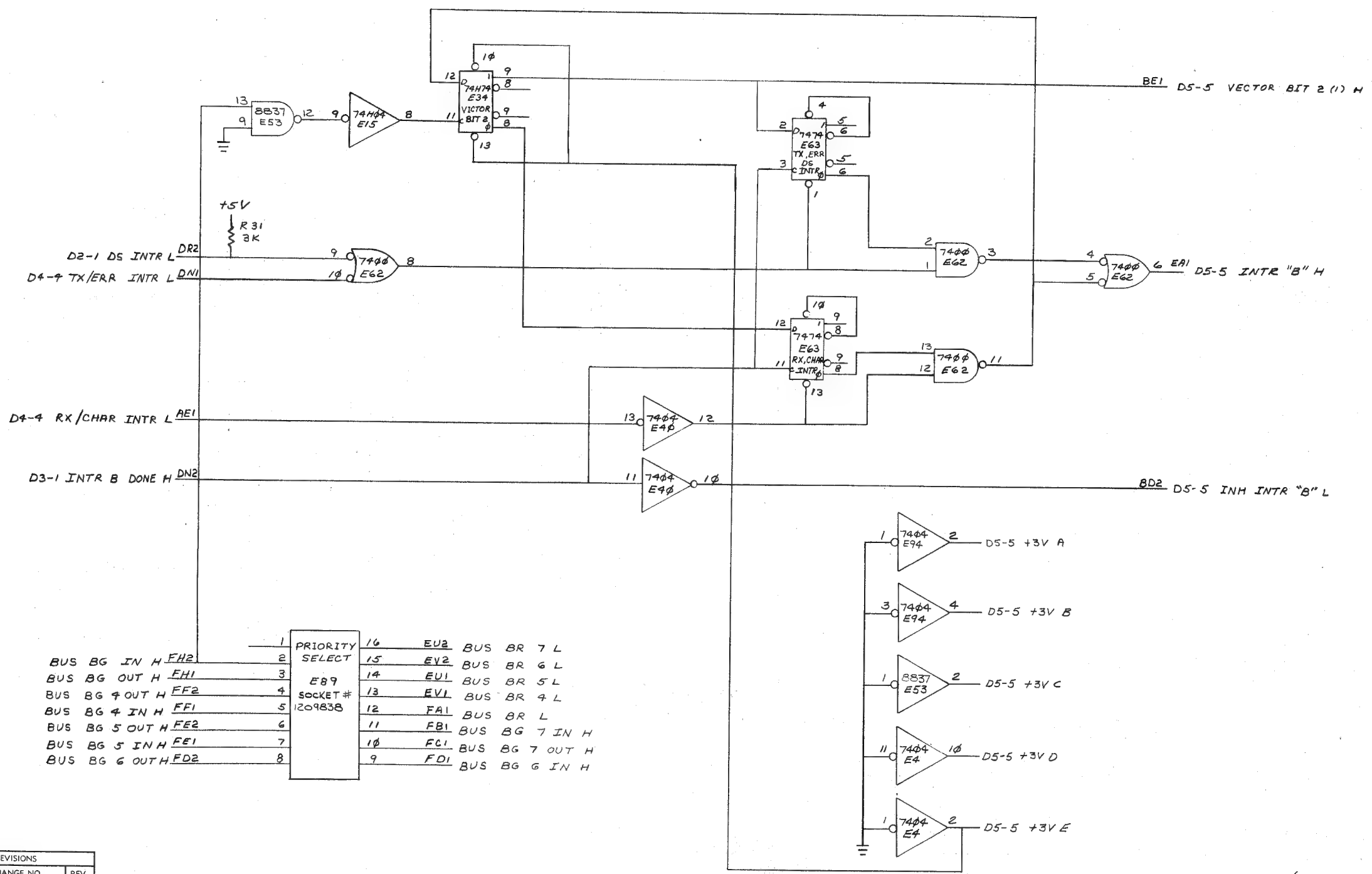


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CHK	CHANGE NO.	REV.

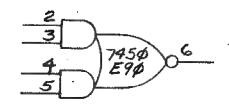
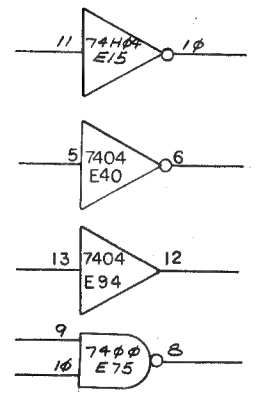
TITLE		SIZE	CODE	NUMBER	REV.
CC/BA AND SHIFT CONTROL (D5-4)				DCS M7813-0-1	K
SCALE		SHEET	6	OF	10
		DIST.			

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DCSM7813-0-1



SPARES

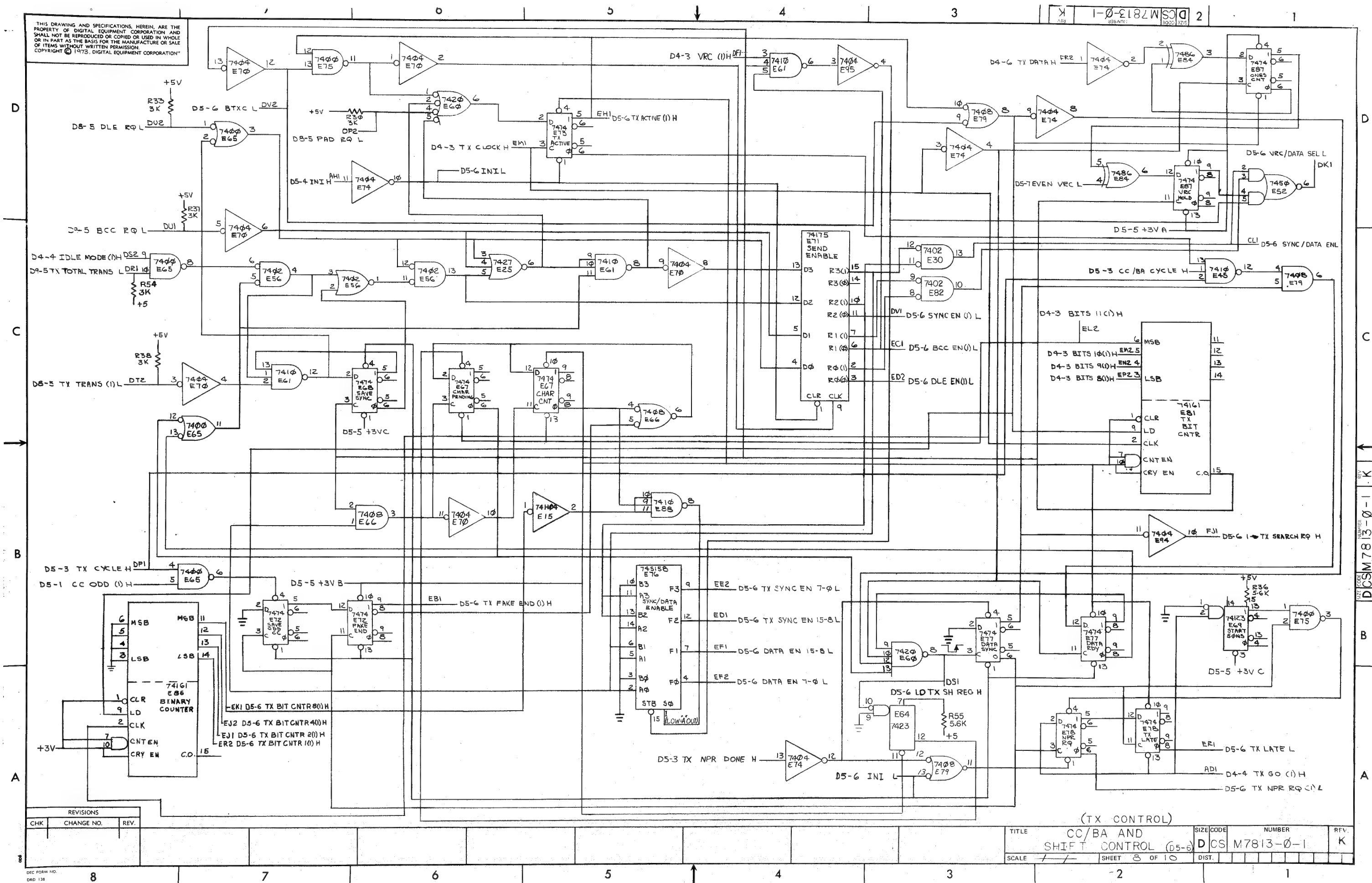


BUS BG IN H FH2	1	PRIORITY	16	EU2	BUS BR 7 L
BUS BG OUT H FH1	2	SELECT	15	EV2	BUS BR 6 L
BUS BG 4 OUT H FF2	3	E89	14	EV1	BUS BR 5 L
BUS BG 4 IN H FF1	4	SOCKET #	13	EV1	BUS BR 4 L
BUS BG 5 OUT H FE2	5	1209838	12	FA1	BUS BR L
BUS BG 5 IN H FE1	6		11	FB1	BUS BG 7 IN H
BUS BG 6 OUT H FD2	7		10	FC1	BUS BG 7 OUT H
	8		9	FD1	BUS BG 6 IN H

REVISIONS		
CHK	CHANGE NO.	REV.

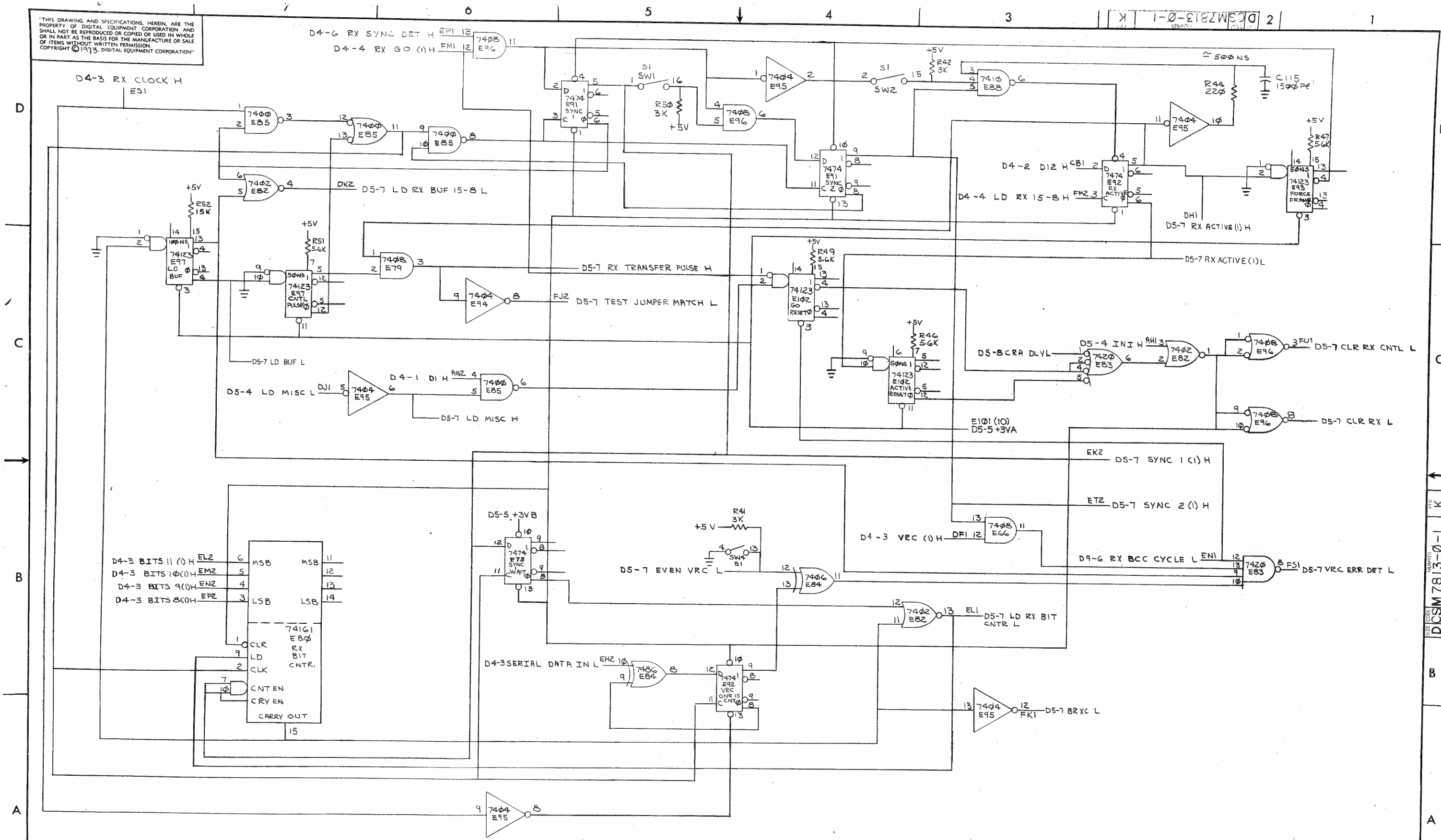
(INTERRUPTS VECTOR CNTL)

TITLE	CC BA AND SHIFT CONTROL (D5-5)	SIZE/CODE	NUMBER	REV.
SCALE		SHEET 7 OF 10	D CSM7813-0-1	K



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K 1-0-0-2182W500 2

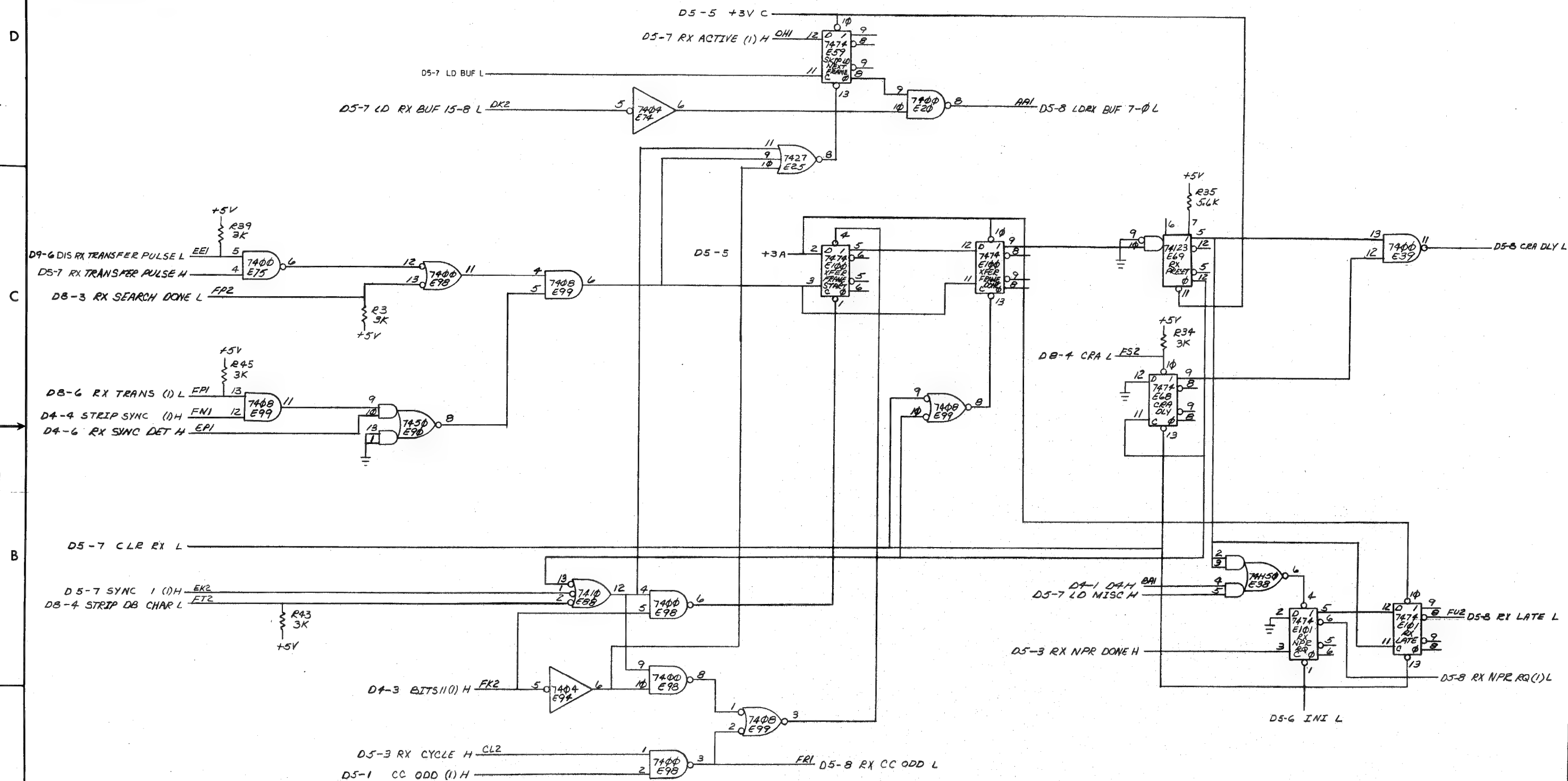


REVISIONS		
CHK	CHANGE NO.	REV.

TITLE		CC/BA AND SHIFT CONTROL (D5-7)	SIZE CODE	NUMBER	REV.
SCALE					
SHEET		9 OF 10	DIST.		

DCSM 7813-0-1 K

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REVISIONS		
CHK	CHANGE NO.	REV.

(RX CHARACTER CNTL.)

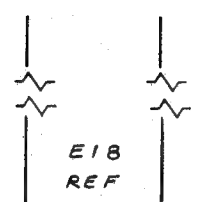
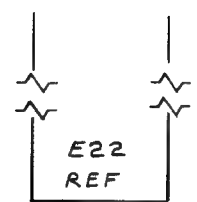
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				D	CS	M7813-0-1	K
SCALE	NONE	SHEET	10	OF	10	DIST.	

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1-0-818ZNY 3003 3215

NOTES:

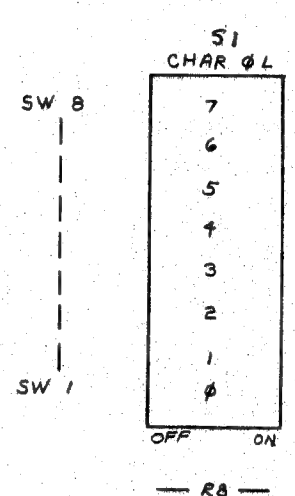
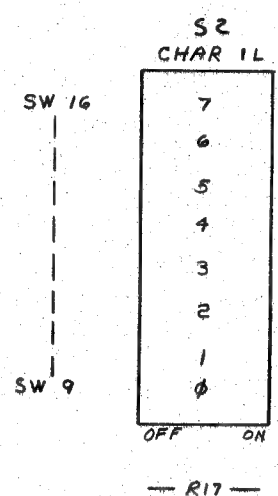
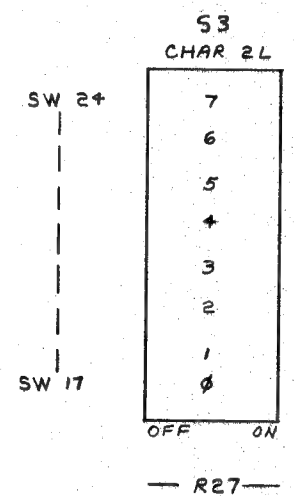
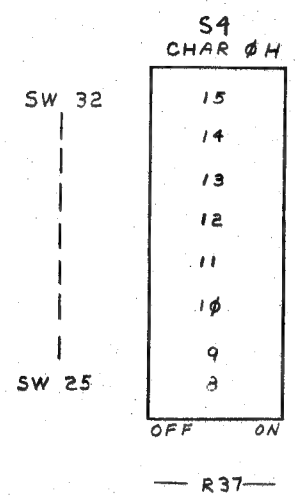
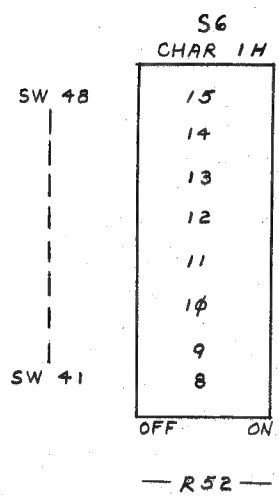
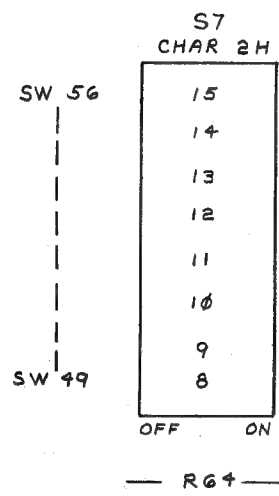
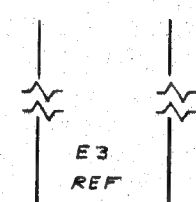
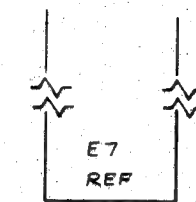
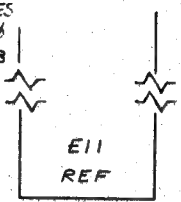
1. SW → SWITCH
2. BOXES (EXCLUDING SW 40-33, CONTAIN BIT POSITIONS FOR "COMPARE. COMPARE FOR ONE IS OFF AND A ZERO IS ON
3. CHARACTER 0, 1, 2 RELATES TO RX CSR BITS 10, 9, 8 RESPECTIVELY.
4. COMPARE FOR SINGLE CHARACTER ≤ 8 BITS USE ENABLES FOR HIGH BYTE AND BIT SELECTIONS FOR 15-8.
5. IF LESS THAN THREE CHARACTERS ARE REQUIRED—REPEAT A USED CHARACTER UNTIL ALL THREE SELECTIONS ARE USED.
6. "INTR EN" (SW 40) ON ENABLES CHARACTER. DETECTED TO SET "CHAR DET FLAG" TO A ONE (M7812 MODULE).
7. "SYNC EN" (SW 39) ALLOWS A SYNC. COMPARE TO SET CD11 AND SET "CHAR DET FLAG" TO A ONE (M7812 MODULE) IF SW 40 IS SET.



SW 40
SW 33

TYP
S5
INTR EN
SYNC EN
0 LOW EN
1 LOW EN
2 LOW EN
2 HIGH EN
1 HIGH EN
0 HIGH EN
OFF ON

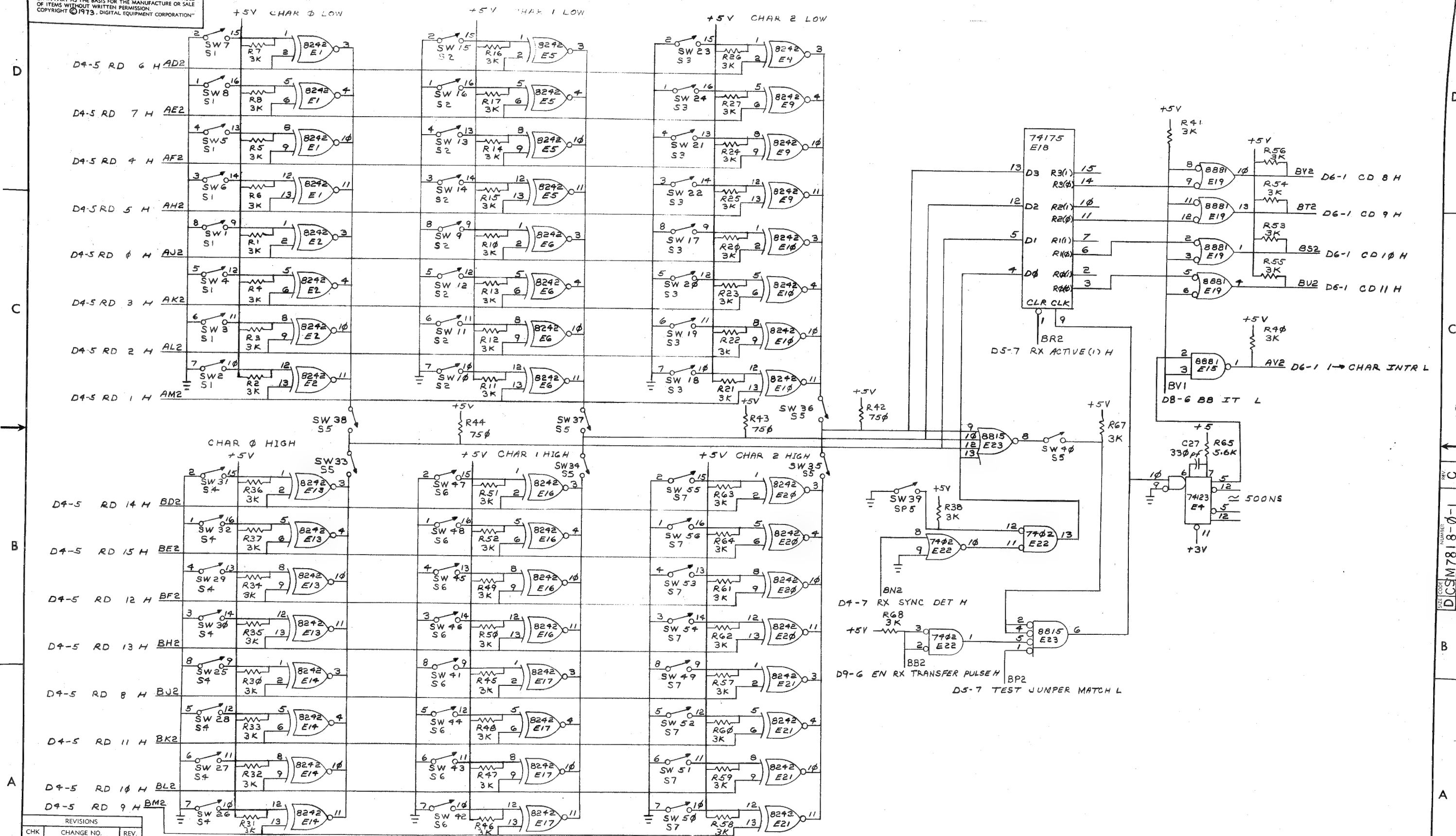
BYTE ENABLES
LOW IS 7-0
HIGH IS 15-8



REVISIONS		
CHK	CHANGE NO.	REV.

TITLE HARD WIRED CHAR DET/NPR CONTROL
SCALE
SHEET 2 OF 4
DISTR.
NUMBER DCS M7818-0-1
REV. C

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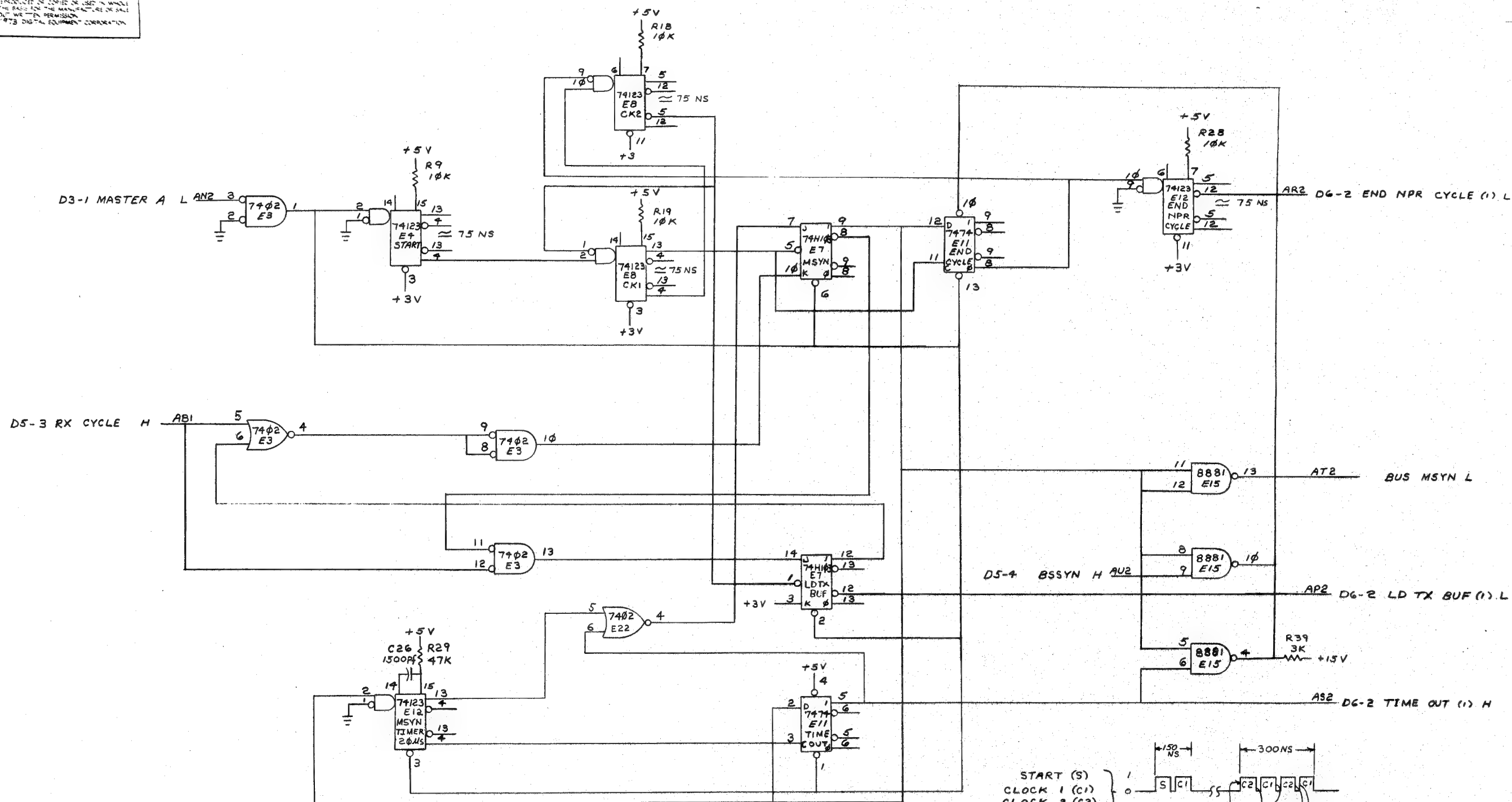


REVISIONS		
CHK	CHANGE NO.	REV.

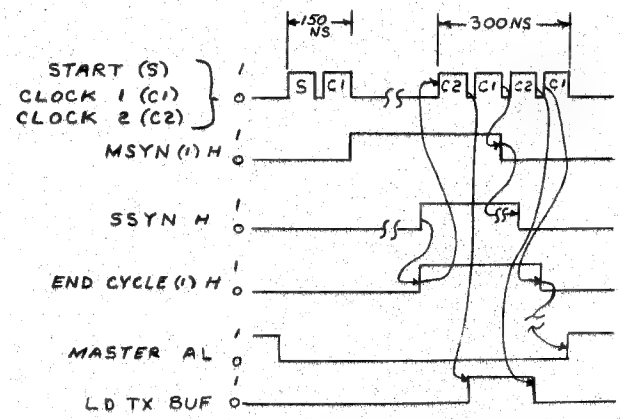
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				D	CS	M7818-0-1				C								
SCALE				SHEET	3	OF	4	DIST.										

REV. C
DCSM7818-0-1

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- NOTES:
1. \overline{SS} IMPLIES BUS RESPONSE.
 2. PULSE TIME (75NS) INCLUDES INTERNAL DELAY FROM TRIGGER.



REVISIONS		
CHG	CHANGE NO.	REV.

TITLE		HARD WIRED CHAR DET/NPR CONTROL (D6-2)		SIZE	CODE	NUMBER		REV.
				D	CS	M7818-0-1		C
SCALE	←————→	SHEET	4 OF 4	DIST.				

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7-0-1100010 2

DQ11-AA / DQ11-AB
D4 / D1
M971

DQ11-AA / DQ11-AB
E4 / E1
M971

DQ11-AA / DQ11-AB
F4 / F1
M971

D4-3 BCC 24-16 (1) H
D4-3 AB MUX SEL H
D4-3 TX CLOCK H
D4-3 RX CLOCK H
D4-5 RX BCC DATA IN L
D4-7 TX DATA H
D5-1 CC/BA ADRS 8 L
D5-1 CC/BA ADRS 9 L
D5-1 CC/BA ADRS 10 L
D5-2 DI PORT 14 L
D5-2 SP PORT 13 H
D5-2 SP PORT 14 H
D5-7 SYNC DATA EN L
D5-3 CNTR LD PULSE H
D5-3 LD SP PORT L
D5-4 SEL 6 LD L
D5-4 INI H

D4-5 TD 0 H
D5-3 RX CYCLE H
D4-5 TD 1 H
D4-5 TD 2 H
D4-5 TD 3 H
D4-5 TD 4 H
D4-5 TD 5 H
D4-5 TD 6 H
D4-5 TD 7 H
D5-6 DLE EN (1) L
D5-6 TX BIT CNTR 4 (1) H
D5-6 TX BIT CNTR 2 (1) H
D5-6 TX BIT CNTR 1 (1) H
D5-6 1 → TX SEARCH RQ H
D8-3 RX SEARCH DONE L
D8-4 STRIP DBL CHAR L
D8-4 0 → RX GO / DONE L

D4-7 STRIP SYNC (1) H
D4-4 LD RX 15-8 H
D4-5 TD 8 H
D4-5 TD 9 H
D4-5 TD 10 H
D4-5 TD 11 H
D4-5 TD 12 H
D4-5 TD 13 H
D4-5 TD 14 H
D4-5 TD 15 H
D8-4 0 → TX GO / DONE L
D8-5 PAD RQ L
D8-5 DLE RQ L
D8-5 TX TRANS (1) L
D8-6 RX TRANS (1) L
D8-6 DLE SAVE (1) L

+5V
D5-6 B TX C L
D3-1 KA CRYSTAL CLOCK H
D5-6 TX FAKE END (1) H
D5-6 TX ACTIVE (1) H
D5-6 SYNC EN L
D5-6 BCC EN (1) L
D5-6 LD TX SH REG H
D5-3 TEST NEXT CC (1) H
D5-7 B RX C L
D5-8 RX CC ODD L
D9-4 BCC/DLE L
D9-5 TX TOTAL TRANS (1) L
D9-5 BCC RQ L
D9-6 RX BCC CYCLE L
D9-6 BCC ERR L
D5-4 RX S (1) H

+5V
D8-4 CRA L
D4-5 RD 6 H
D4-5 RD 7 H
D4-5 RD 4 H
D4-5 RD 5 H
D4-5 RD 0 H
D4-5 RD 3 H
D4-5 RD 2 H
D4-5 RD 1 H
D3-1 MASTER A L
D6-2 LD TX BUF (1) H
D6-2 END NPR CYCLE (1) L
D6-2 TIME OUT (1) H
BUS MSYN L
D5-4 BSSYN H
D6-1 1 → CHAR INTR L

+5V
D9-6 DIS RX TRANSFER PULSE L
D4-5 RD 14 H
D4-5 RD 15 H
D4-5 RD 12 H
D4-5 RD 13 H
D4-5 RD 8 H
D4-5 RD 11 H
D4-5 RD 10 H
D4-5 RD 9 H
D4-7 RX SYNC DET
D5-7 TEST JUMPER MATCH L
D5-7 RX ACTIVE (1) H
D6-1 CD 10 H
D6-1 CD 9 H
D6-1 CD 11 H
D6-1 CD 8 H

REV	CHANGE NO.	DATE
A	00002	2-25-74
B	00003	2-25-74
C	00004	2-25-74
D	00005	2-25-74
E	00006	2-25-74
F	00007	2-25-74
G	00008	2-25-74
H	00009	2-25-74
I	00010	2-25-74
J	00011	2-25-74
K	00012	2-25-74
L	00013	2-25-74
M	00014	2-25-74
N	00015	2-25-74
O	00016	2-25-74
P	00017	2-25-74
Q	00018	2-25-74
R	00019	2-25-74
S	00020	2-25-74
T	00021	2-25-74
U	00022	2-25-74
V	00023	2-25-74
W	00024	2-25-74
X	00025	2-25-74
Y	00026	2-25-74
Z	00027	2-25-74

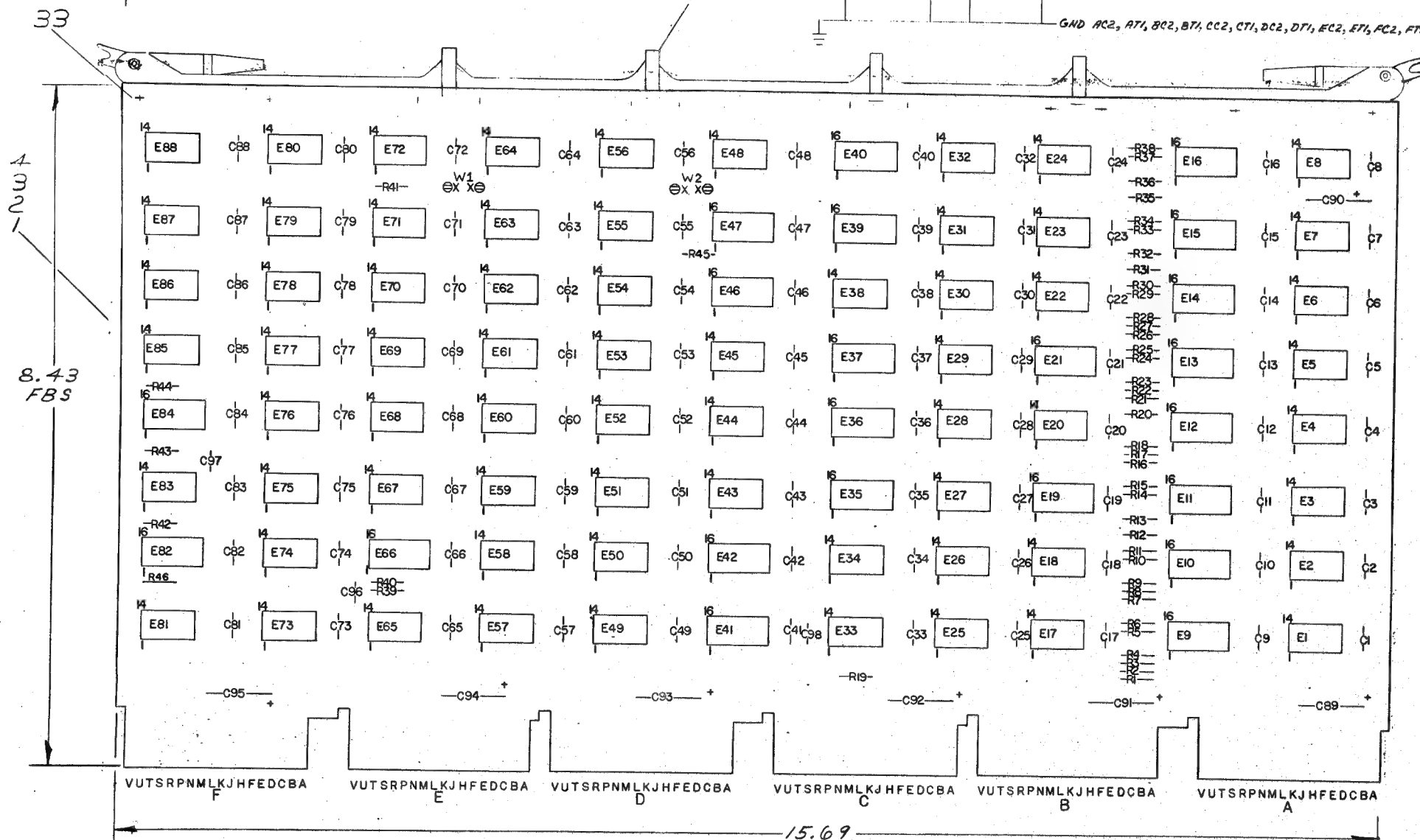
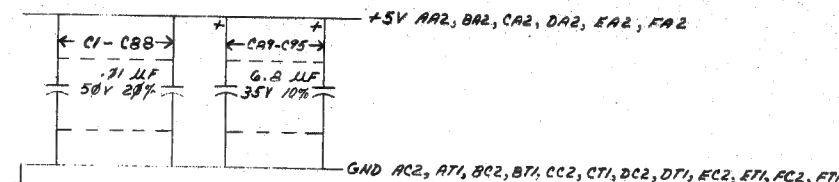
DEC FORM NO. 102-C

FIRST USED ON OPTION/MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11				
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES				
TOLERANCES				
DECIMALS	ANGLES			
.XXX = .005	±0° 30'			
.XX = .02				
.X = .1				
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY Y				
MATERIAL				
FINISH				
NEXT HIGHER ASSY.				
B-DD-DQ11-0				
SCALE NONE				
SHEET 1 OF 1				
DIST.				
TITLE				
DQ11-AA / DQ11-AB CONNECTIONS (D7-1)				
SIZE CODE				
NUMBER				
REV.				
A				

NOTES:

JUMPER	JUMPER IN FUNCTION
N1	FEED 17 TWO PAGES *
N2	BCC INCLUDES START CHAR. *

* JUMPER IN NOT DIAGNOSTIC SUPPORTED



REF		COORDINATE HOLE LOCATION	K-C0-M7817-0-4	1
REF		ASSY/DRILLING HOLE LAYOUT	D-AH-M7817-0-5	2
REF		MODULE ECD HISTORY	B-MH-M7817-0-6	3
1		ETCHED CIRCUIT BOARD	5010553	4
1	C97	CAPACITOR 10PF 100V 5% D.M.	1000006	5
2	C96, C98	CAPACITOR 330PF 100 5% D.M.	1000023	6
88	C1-C88	CAPACITOR .01UF 50V 20% AX	1001610-01	7
7	C89-C95	CAPACITOR 6.8UF 35V 10% TANT	1005306	8
1		HANDLE ASSY	1210711-2	9
37	R1-R18, R20-R38	RESISTOR 470 $\frac{1}{4}$ W 5%	1300316	10
6	R39-R43, R45, R46	RESISTOR 5.6K $\frac{1}{4}$ W 5%	1301874	11
14	E56, E82, E63, E64, E68, E69, E70 E71, E72, E81, E83, E26, E30, E61	IC DEC 7474	1905547	12
8	E33, E52, E54, E55, E60, E73, E78, E75	IC DEC 7400	1905675	13
5	E24, E53, E86, E87, E85	IC DEC 7410	1905576	14
1	E76	IC DEC 7420	1905577	15
2	E45, E58	IC DEC 7450	1905580	16
2	E59, E74	IC DEC 7402	1909004	17
1	E57	IC DEC 74H21	1909058	18
3	E49, E50, E51	IC DEC 74H55	1909063	19
2	E20, E28	IC DEC 74H11	1909267	20
7	E2, E4, E6, E8, E43, E67, E80	IC DEC 7404	1909686	21
5	E1, E3, E5, E7, E44	IC DEC 8881	1909705	22
10	E17, E18, E22, E23, E25, E27, E28 E38, E31, E34	IC DEC 8242	1909712	23
1	E36	IC DEC 74151	1909936	24
1	E32	IC DEC 7486	1910011	25
1	E48	IC DEC 7437	1910091	26
4	E65, E77, E79, E88	IC DEC 7408	1910155	27
3	E66, E82, E84	IC DEC 74123	1910436	28
1	E40	IC DEC 74181	1910650	29
5	E35, E37, E39, E41, E47	IC DEC 74175	1910651	30
8	E9, E10, E11, E12, E13, E14, E15 E16,	IC DEC 3101	1910653	31
4	E19, E21, E42, E48	IC DEC 74157	1910655	32
12		EYELET	9006732	33
4		SPLIT LUG	9006735	34
1	R19	RESISTOR 220 $\frac{1}{4}$ W 5%	1300271	35
1	R44	RESISTOR 10K $\frac{1}{4}$ W 5%	1300479	36

QTY	REF DESIGNATION										DESCRIPTION										PART NO.										ITEM NO.	
PARTS LIST																																
ETCH BOARD REV										D																						

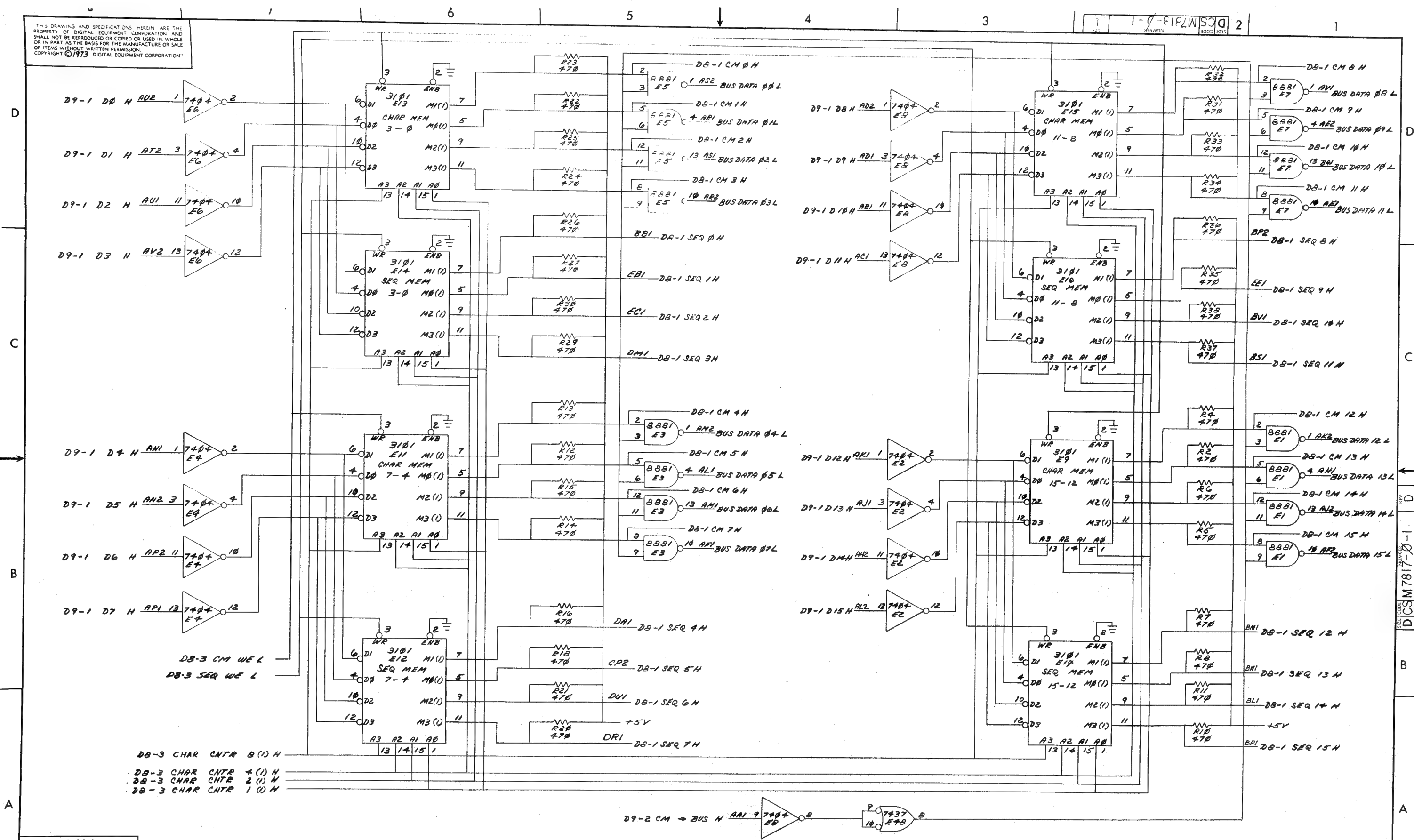
A	DIC 3101	B	16
	DEC 74175	B	16
	DEC 74151	B	16
	IC TYPE	GND	+ 5V
	GND AND 5V ARE USUALLY PIN 7 AND 14 RESPECTIVELY EXCEPTIONS ARE STATED ABOVE		
	IC PIN LOCATIONS		

DEC 74151	8	16
IC TYPE	GND	+5V

GND AND 5V ARE USUALLY PIN 7 AND 14
RESPECTIVELY. EXCEPTIONS ARE STATED ABOVE

DEC FORM NO
DRD-135A

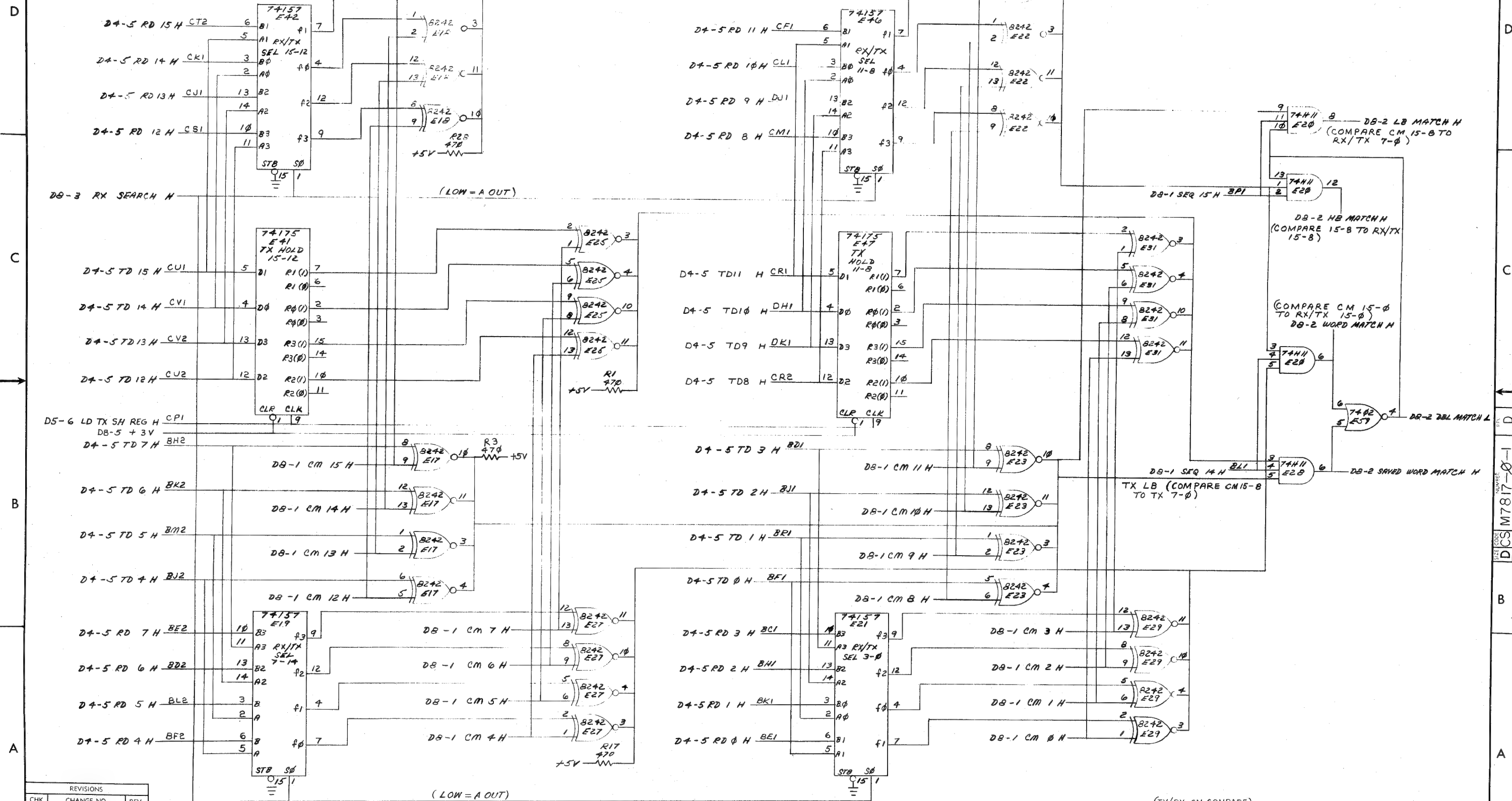
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REVISIONS		
CHK	CHANGE NO.	REV.

TITLE		SIZE CODE	NUMBER	REV.
CHAR DET & SEQ CNTL (D8-1)		D	CSM7817-0-1	D
SCALE	SHEET 3 OF 8	DIST.		

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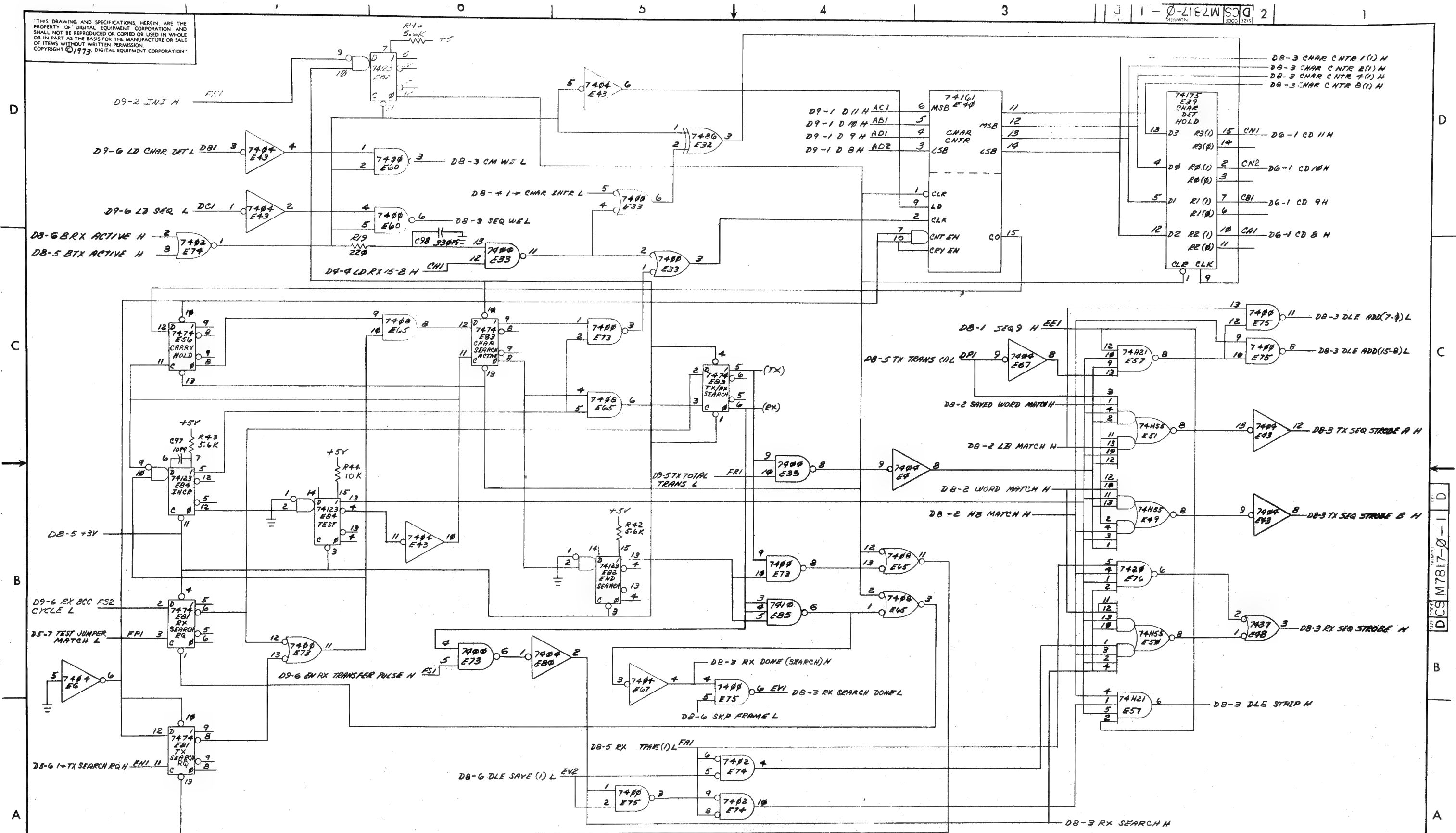


REVISIONS		
CHK	CHANGE NO.	REV.
	E. Wilson	A

DEC FORM NO
DRD 124

(TX/RX CM COMPARE)									
TITLE CHAR DET & S-Q CNTL (D8-2)					SIZE D	CODE CS	NUMBER M7817-Ø-1		REV D
SCALE 1/16		SHEET 4 OF 8			DIST.				

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REVISIONS		
CHK	CHANGE NO.	REV.

DEC FORM NO.
DRD 138

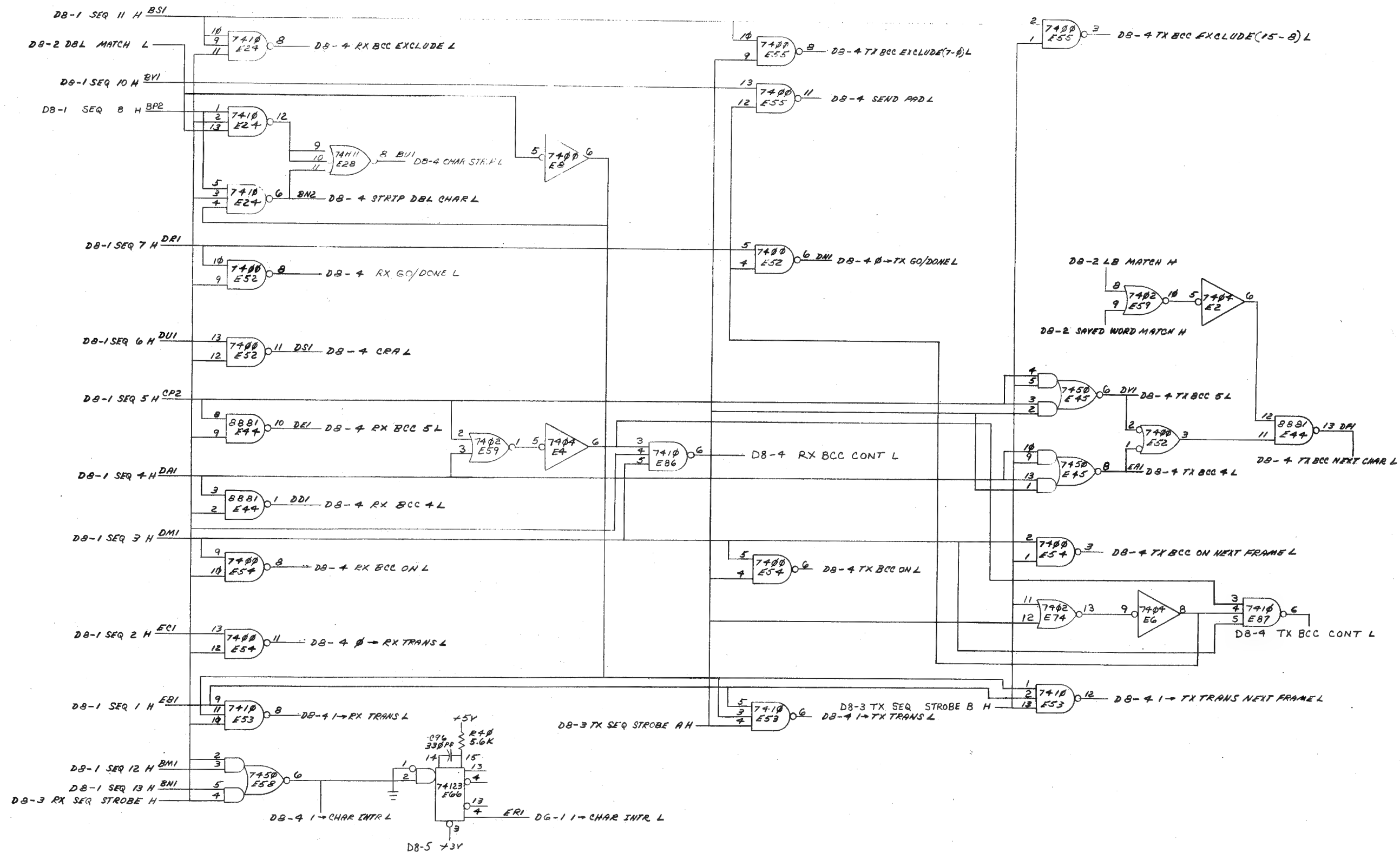
(CHAR DET CONTROL)

TITLE	CHAR DET & SEQ CNTL
	(P8)

SIZE	CODE	NUMBER					REV.
D	CS	M7817-Ø - I					D
DIST.							

SCALE SHEET 5 OF 8

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REVISIONS		
CHK	CHANGE NO.	REV.

TITLE		SIZE	CODE	NUMBER	REV.
CHAR DET & SEQ CNTL (D8-4)		D	C	M7817-0-1	D
SCALE		SHEET		OF	
/ /		6		8	

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1-0-1182W SCD 2

D

C

B

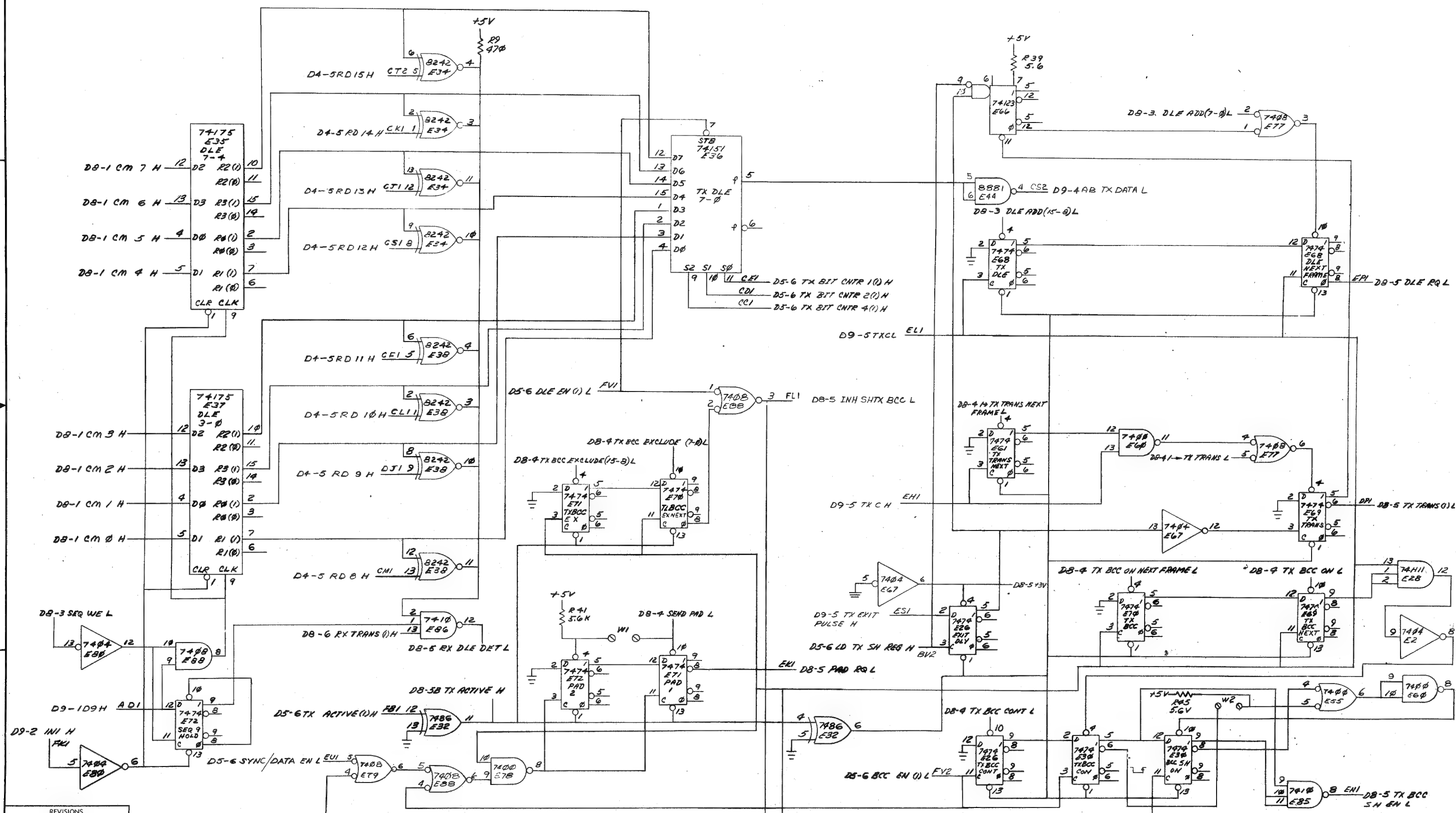
A

D

C

B

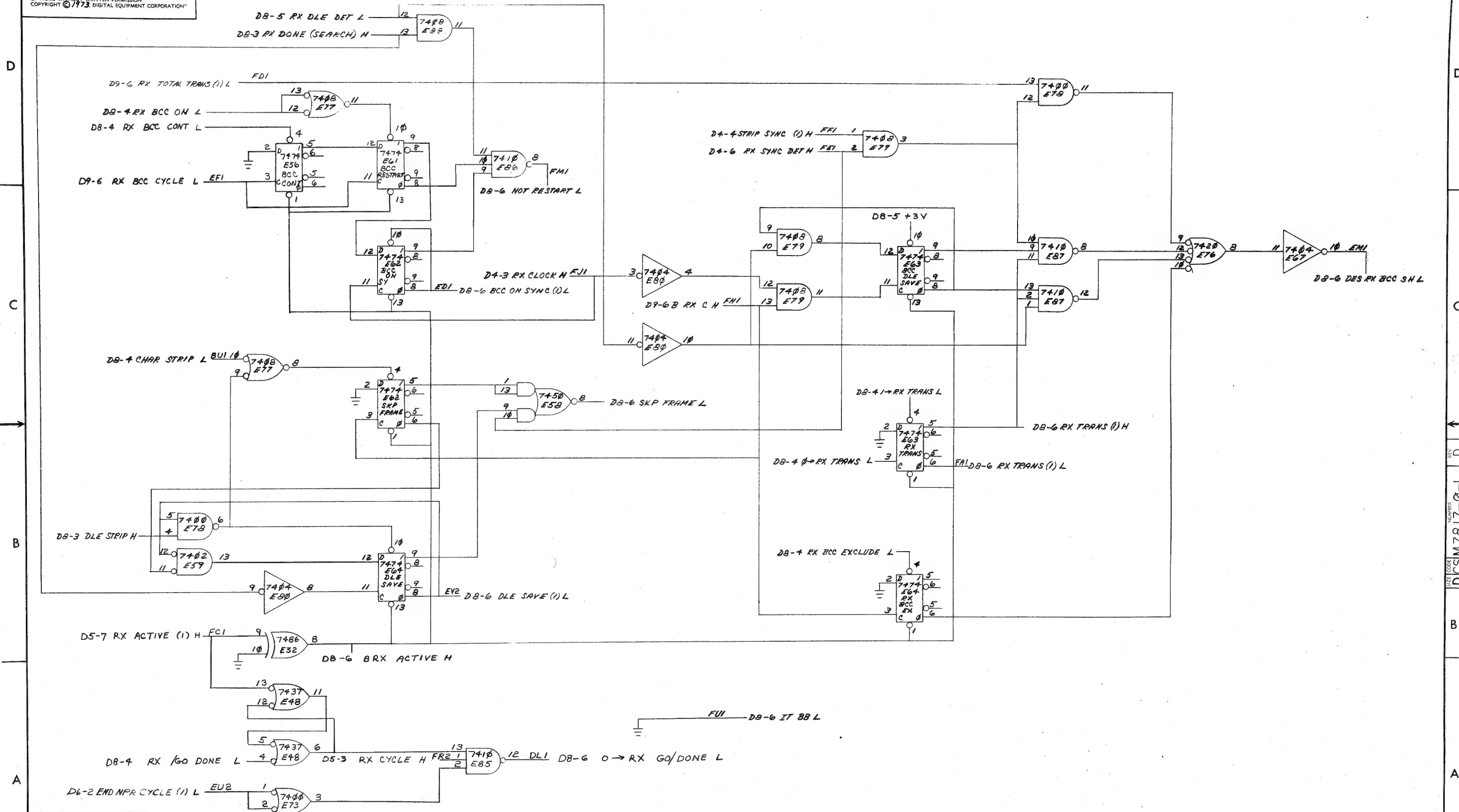
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REVISIONS		
CHK	CHANGE NO.	REV.

(TX PROTOCOL CNTL)		TITLE		SIZE CODE	NUMBER	REV.
CHAR DET & SEQ CNTL		(D8-5)		D	CSM7817-0-1	D
SCALE		SHEET		DIST.		
		7 OF 8				

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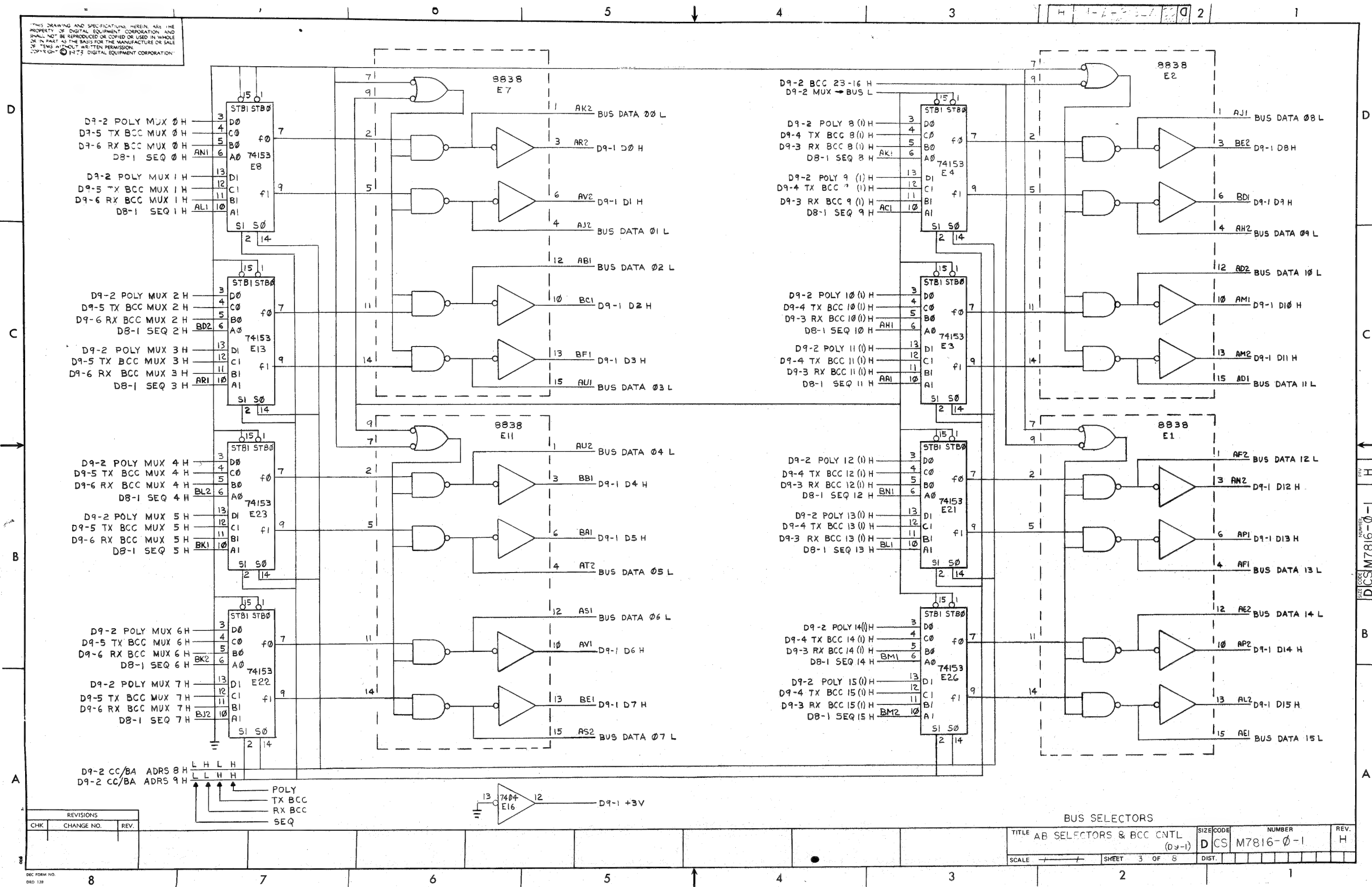


REVISIONS		
CHK	CHANGE NO.	REV.
		A

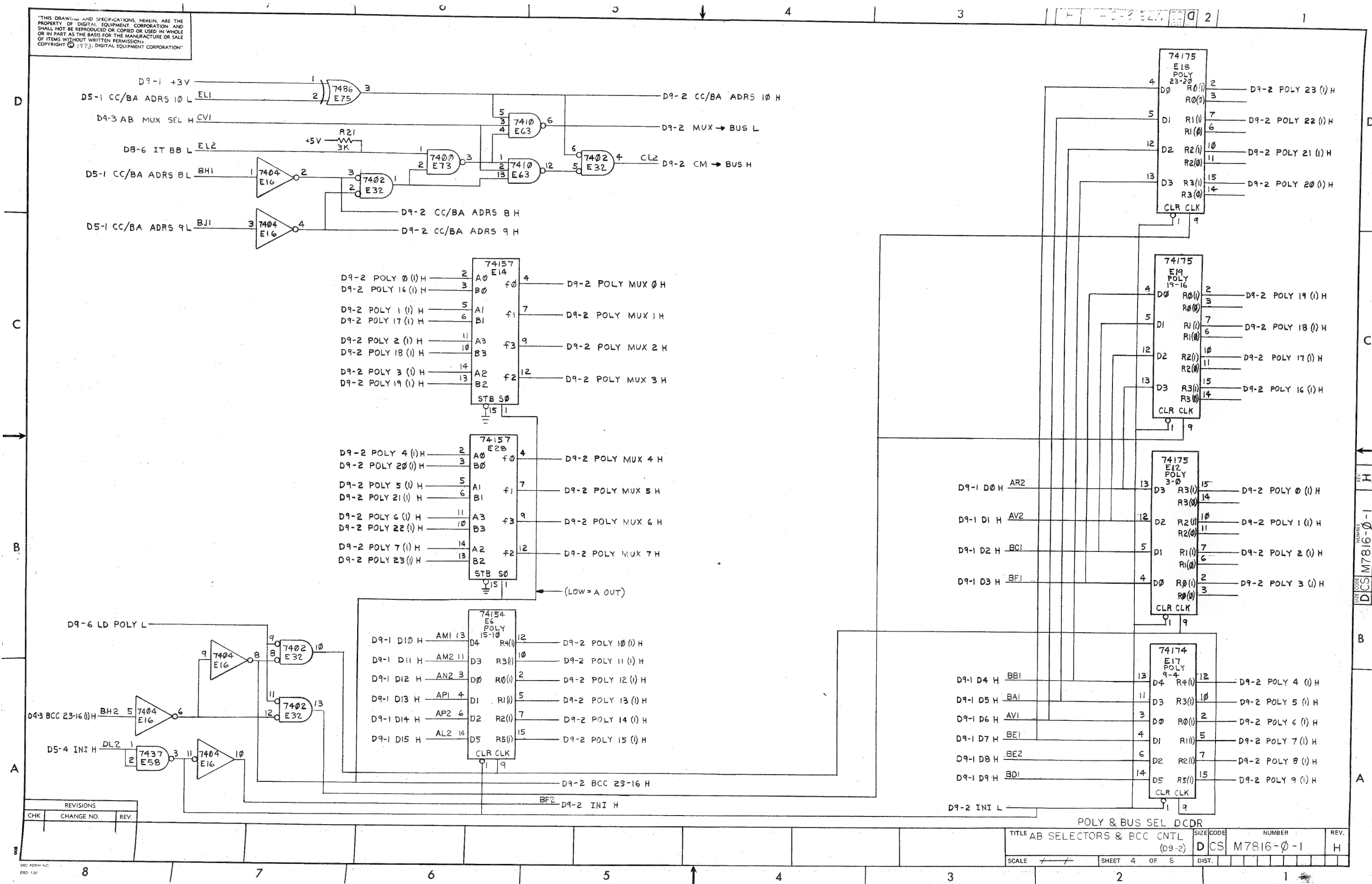
(RX PROTOCOL CNTL)

TITLE	SIZE CODE	NUMBER	REV.
CHAR DET & SEQ CNTL (DB-6)	D	CSM7817-0-1	D
SCALE	SHEET	8 OF 8	DIST.

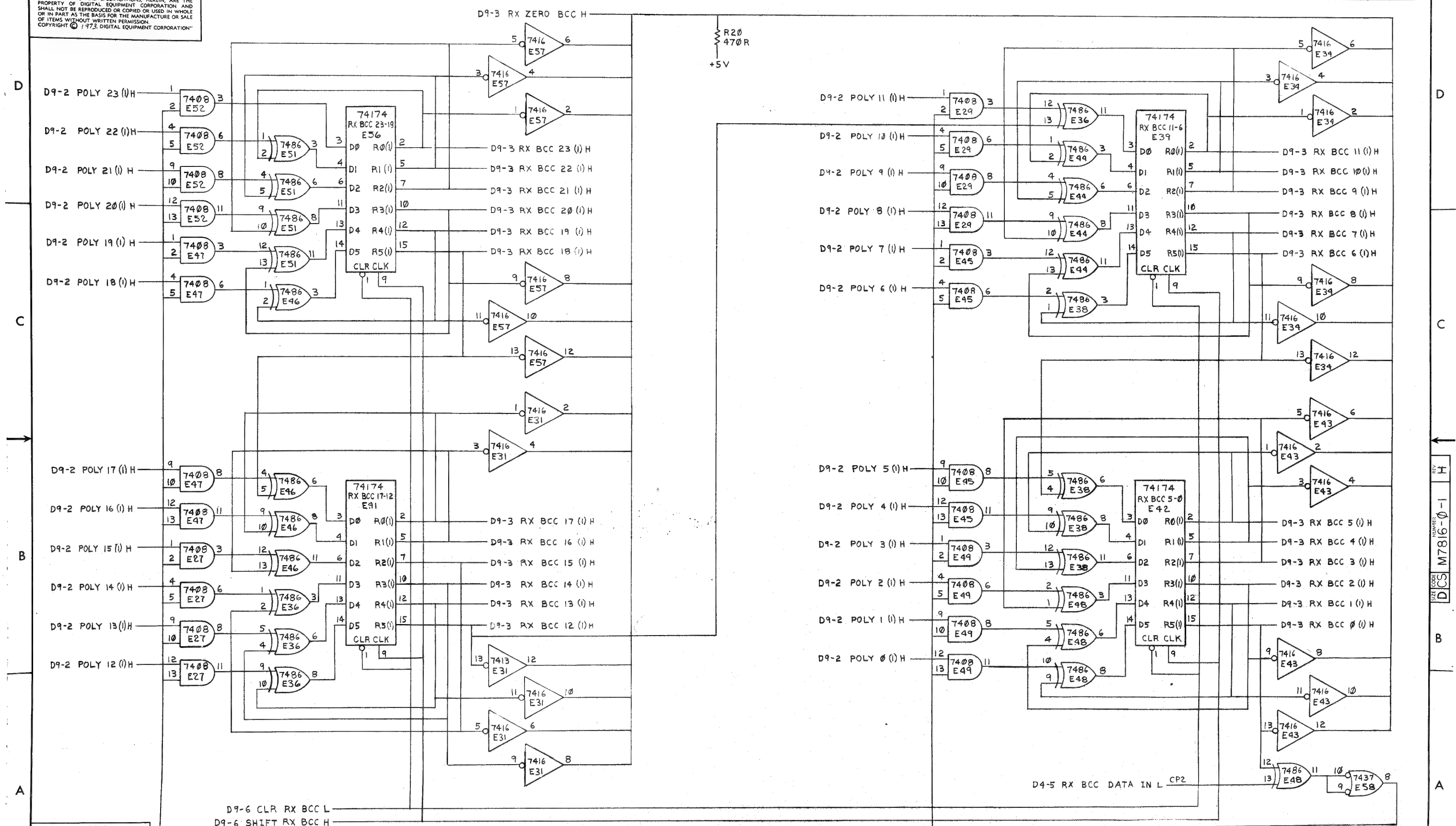
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REVISIONS		
CHK	CHANGE NO.	REV.

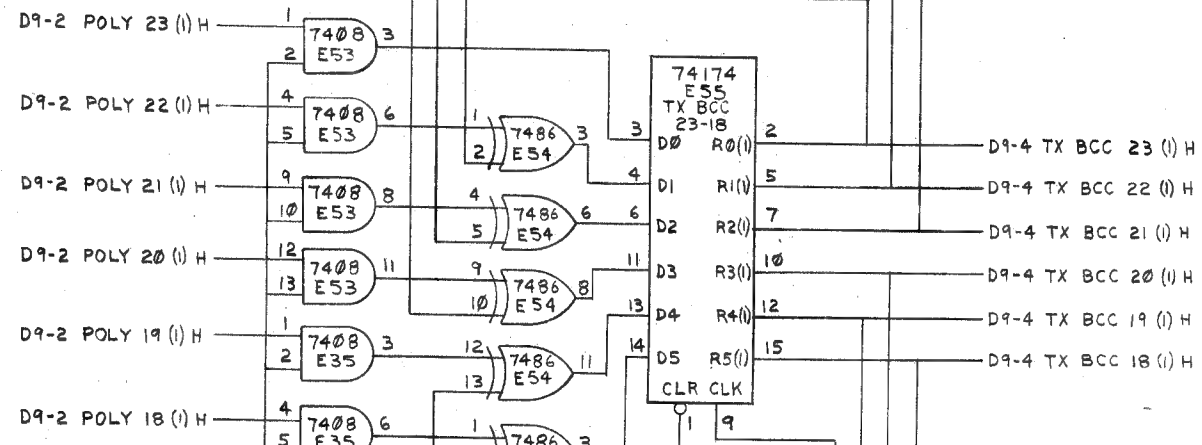
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AB SELECTORS & BCC CNTL (D9-3)		D CS	M7816-0-1	H
SCALE	SHEET 5 OF 8	DIST.	1	

REV. H
NUMBER M7816-0-1
SIZE CODE DCS

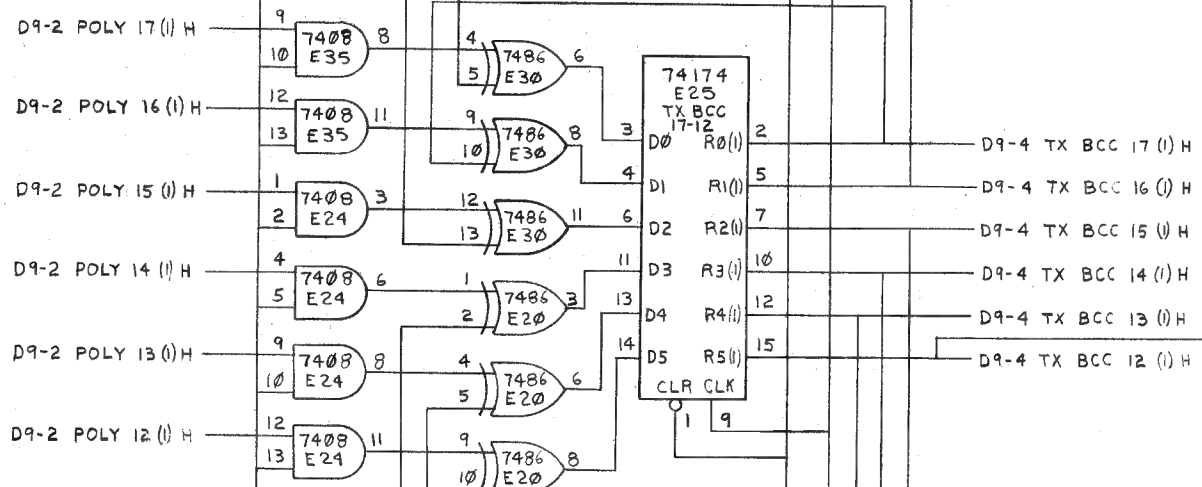
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1-0-9182W SCD 2

D

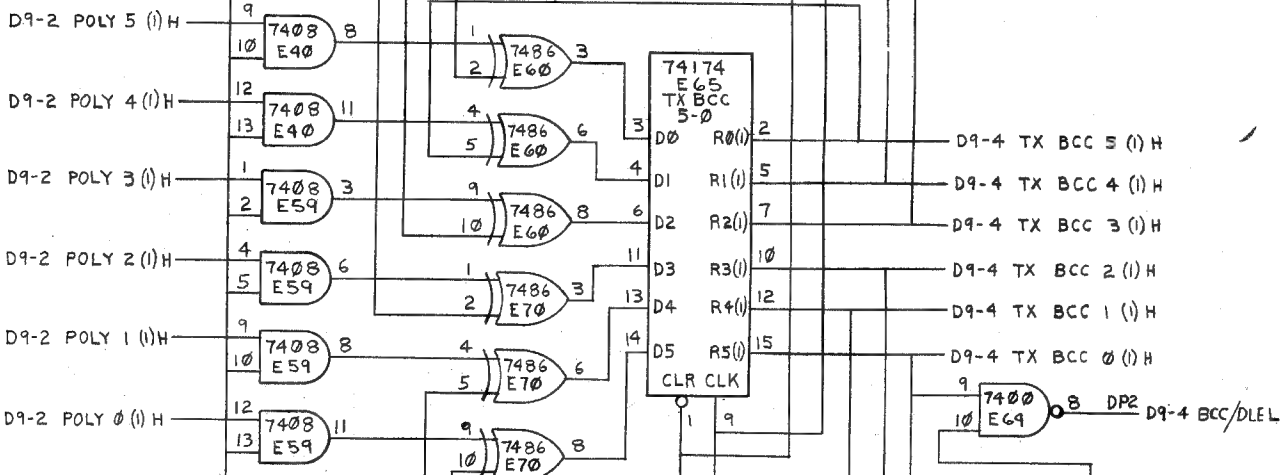
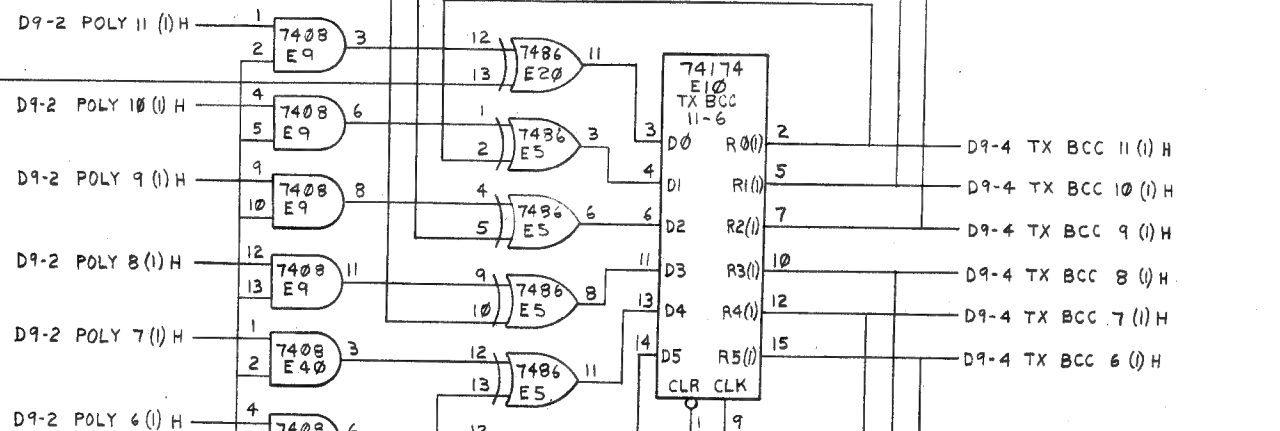


C



D9-5 CLR TX BCC H

D9-5 SHIFT TX BCC H



D9-4 BCC/DLE L

D4-6 TX DATA H EEI

D5-6 BCC EN (I) L EDI

TX BCC GENERATOR

TITLE	AB SELECTORS & BCC CNTL (D9-4)	SIZE	CODE	NUMBER	REV.
SCALE	+	SHEET	6 OF 8	D CS M7816-0-1	H

REVISIONS		
CHK	CHANGE NO.	REV.

DEC FORM NO. 138

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D8-4 TX BCC NEX CHAR L
D5-6 TX FAKE END () H
D9-4 TX BCC 4 L
D9-6 W1 H
D9-4 TX BCC 5 L
D9-6 W2 H

FN2
FH1
FV1
FP2

D9-5 TX TOTAL TRANS () L FK1

D5-3 TEST NEXT CC() H CU2
D5-3 CNTR LD PULSE H EV2

D5-2 SP PORT 14 H FN1

D5-2 SP PORT 13 H FV2

D5-3 RX CYCLE H FB1

D5-6 LD TX SH REG H EMI

D9-1 +3V

FU2 D9-5 TX EXIT PULSE H

D5-6 BTXC L FS2

D5-6 BCC EN() H ED1

D5-6 TX ACTIVE() H FD2

D8-5 TX BCC SH EN L EV1

D9-2 INI L

D9-4 TX BCC 0 () H
D9-4 TX BCC 16 () H
D9-4 TX BCC 1 () H
D9-4 TX BCC 17 () H
D9-4 TX BCC 2 () H
D9-4 TX BCC 18 () H
D9-4 TX BCC 3 () H
D9-4 TX BCC 19 () H

D9-5 TX BCC MUX 0 H
D9-5 TX BCC MUX 1 H
D9-5 TX BCC MUX 2 H
D9-5 TX BCC MUX 3 H

D9-4 TX BCC 4 () H
D9-4 TX BCC 20 () H
D9-4 TX BCC 5 () H
D9-4 TX BCC 21 () H
D9-4 TX BCC 6 () H
D9-4 TX BCC 22 () H
D9-4 TX BCC 7 () H
D9-4 TX BCC 23 () H

D9-5 TX BCC MUX 4 H
D9-5 TX BCC MUX 5 H
D9-5 TX BCC MUX 6 H
D9-5 TX BCC MUX 7 H

D9-2 BCC 24-16 H (LOW=A OUT)

REVISIONS		
CHK	CHANGE NO.	REV.

TX BCC CNTL

TITLE		SIZE	CODE	NUMBER		REV.
AB SELECTORS & BCC CNTL (D9-5)		D	CS	M7816-0-1		H
SCALE		SHEET 7 OF 8		DIST.		

REV. COSY NUMBER M7816-0-1 DCS

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1-0-9152W SD 2

D

C

B

A

D

C

B

A

D8-6 RX TRANS L FFI 4
D9-6 RX TOTAL TRANS (I) L

D8-6 DES RX BCC SH L EJ2

D5-2 TEST JUMPER L FJ1

D4-4 STRIP SYNC (I) H DNI

D4-6 SYNC DET H DMI

D9-5 B CNTR LPH
D5-3 RX CYCLE H
D5-2 SP PORT 13 H

D5-7 RX ACTIVE (I) H DD2

D5-7 B RX C L EHI

D5-8 RX CC ODD L EKI

D9-3 RX BCC 0 (I) H
D9-3 RX BCC 16 (I) H
D9-3 RX BCC 1 (I) H
D9-3 RX BCC 17 (I) H
D9-3 RX BCC 2 (I) H
D9-3 RX BCC 18 (I) H
D9-3 RX BCC 3 (I) H
D9-3 RX BCC 19 (I) H

D9-3 RX BCC 4 (I) H
D9-3 RX BCC 20 (I) H
D9-3 RX BCC 5 (I) H
D9-3 RX BCC 21 (I) H
D9-3 RX BCC 6 (I) H
D9-3 RX BCC 22 (I) H
D9-3 RX BCC 7 (I) H
D9-3 RX BCC 23 (I) H

D9-2 POLY 23-16 (LOW=A OUT)

D5-2 DI PORT 14 L FE2

D5-3 LD SP PORT L DRI

D9-2 CC/BA ADRS 10 H

D9-2 CC/BA ADRS 9 H

D9-2 CC/BA ADRS 8 H

D5-4 SEL6 LD L DPI

7442
E62
PT
DCDR
D3
D2
D1
D0

7442
E61
RGPT
WRITE
D3
D2
D1
D0

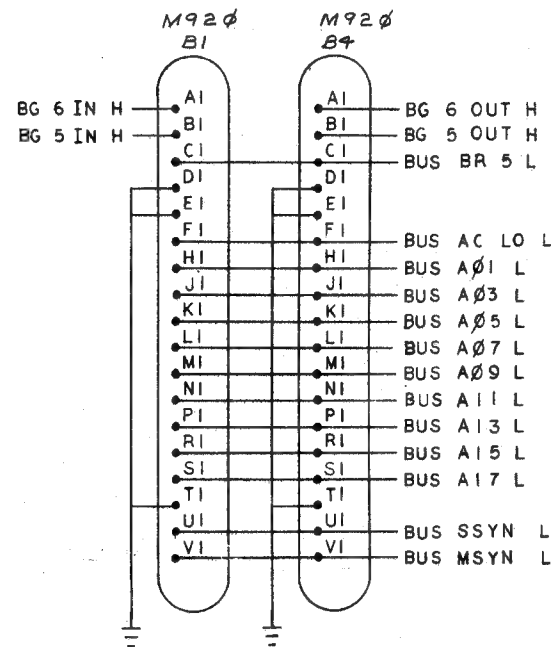
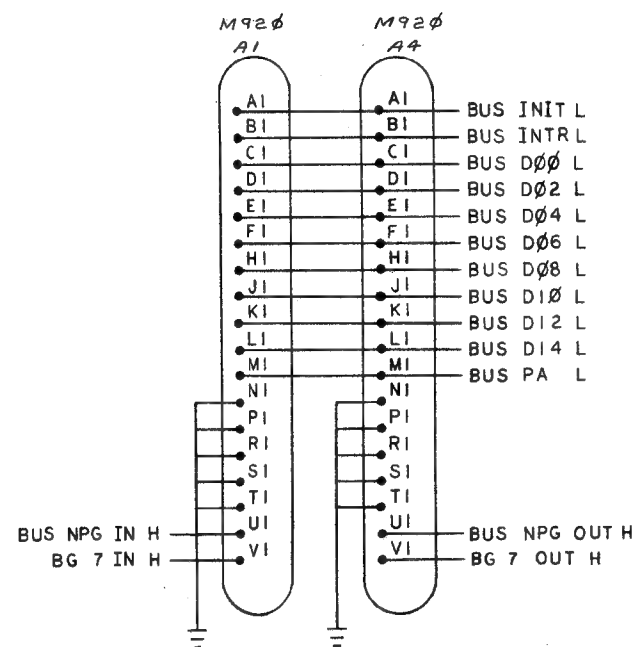
D5-4 RX S (I) H ED2

D9-6 LD CHAR DET L

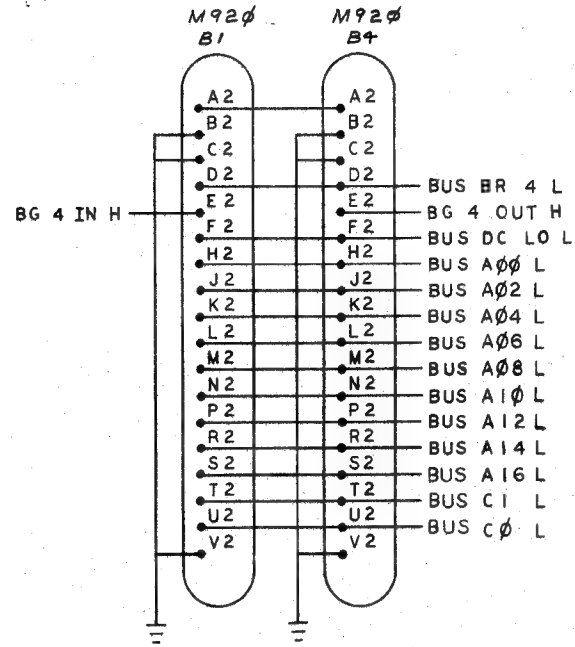
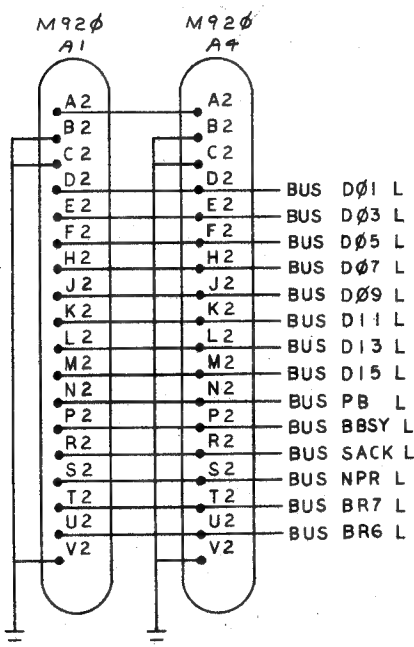
RX BCC CNTL

TITLE AB SELECTORS & BCC CNTL (D9-6)
SCALE 1:1 SHEET 3 OF 8
SIZE CODE DCS
NUMBER M7816-0-1
REV. H

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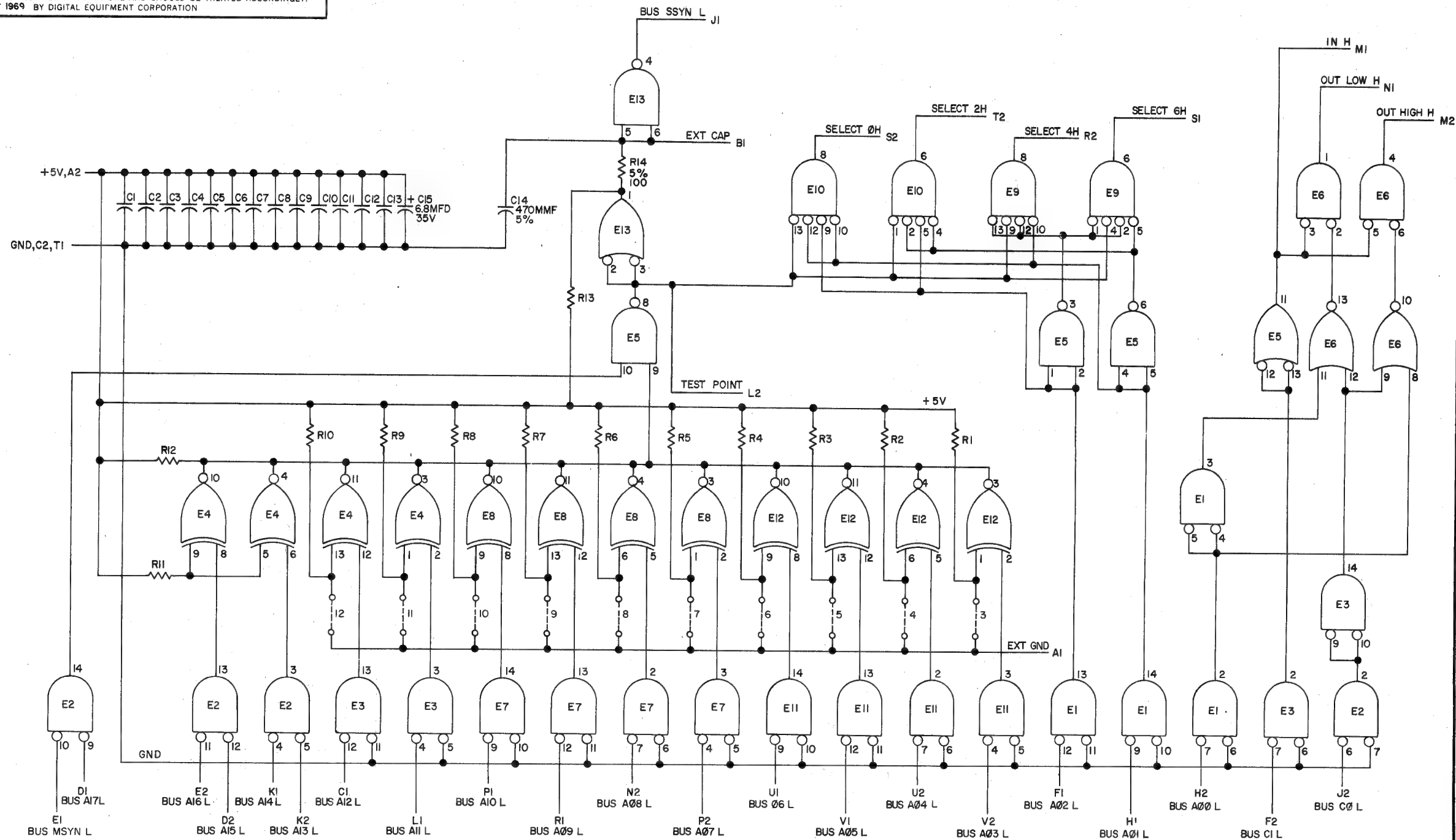


- NOTES:
1. THE UNIBUS CONNECTOR IS A DOUBLE HEIGHT MODULE.
2. IF DQ11 IS LAST DEVICE ON THE BUS, REPLACE M920 WITH A M930 BUS TERMINATOR.



FIRST USED ON OPTION/MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11				
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES	DRN. <i>Wilson</i> DATE <i>5/1/73</i>	PARTS LIST		
TOLERANCES	DATE <i>11/1/73</i>	digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS		
DECIMALS	ENG. <i>R. Fair</i> DATE <i>12-10-72</i>	TITLE		
ANGLES	PROJ. ENG. <i>R. Fair</i> DATE <i>12-10-72</i>	UNIBUS® CONNECTORS		
.XXX = .005	PROD. <i>R. Wall</i> DATE <i>12-11-72</i>			
.XX = .02				
.X = .1				
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY <i>V</i>				
MATERIAL	NEXT HIGHER ASSY.	SIZE CODE	NUMBER	REV.
FINISH	B-DD-DQ11-0	D IC	DQ11-0-6	
	SCALE	DIST.		
	SHEET / OF /			

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UNLESS OTHERWISE INDICATED:
 O---O INDICATES JUMPERS
 RESISTORS ARE 1K, 1/4W, 5%
 CAPACITORS ARE .01MFD, 100V, 20%
 E1, E2, E3, E7, E11 ARE DEC8640
 E4, E8, E12 ARE DEC8242
 E9, E10 ARE DEC8815
 E5 IS DEC74H00
 E6 IS DEC7402
 E13 IS DEC8881
 PIN 1 ON E1, E2, E3, E7, E11 = GND
 PIN 8 ON E1, E2, E3, E7, E11 = +5V
 PIN 7 ON E4, E5, E6, E8, E9, E10, E12, E13 = GND
 PIN 14 ON E4, E5, E6, E8, E9, E10, E12, E13 = +5V

REV	CHK	CHG	NO	REV
A	LRI			
B		00002		
C		00003		

DEC FORM NO. DRC 102

AS 449-P6

DRN: B. Roney
 DATE: 11-26-69
 CHK'D: 1-9-70
 DATE: 1-9-70
 ENG: 3-2-70
 DATE: 3-2-70
 PROD: 11-7-70
 DATE: 11-7-70

TRANSISTOR & DIODE CONVERSION CHART			
DEC	EIA	DEC	EIA

digital
 EQUIPMENT CORPORATION
 MAYNARD, MASSACHUSETTS

TITLE			
ADDRESS SELECTOR MI05			
SIZE	CODE	NUMBER	REV.
C	CS	MI05-0-1	C
PRINTED CIRCUIT REV.			
C			

REV. C
 NUMBER MI05-0-1
 SIZE CODE CS
 C

Dist. 7-2-70, 1353 5 Pink

PARTS REFERENCE			
ITEM NO	DRAWING REFERENCE	DESCRIPTION	PART NUMBER QUANTITY
1	E12, E18	I.C. DEC 7474	1905547 2
2	E4, E7, E17	I.C. DEC 7400	1905575 3
3	E6, E13, E14	I.C. DEC 7402	1909004 3
4	E1, E11	I.C. DEC 8640	1911469 2
5	E5	I.C. DEC 74H74	1909667 1
6	E2, E8, E9, E15, E16	I.C. DEC 8881	1909705 5
7	E3	I.C. DEC 74H04	1909931 1
8	E10	I.C. DEC 7408	1910155 1
9	C19, C20	CAP. 100PF, 100V, 5% DM	1000023 2
10	C18	CAP. 6.8MFD, 35V, 20% TANT	1000067 1
11	C1 THRU C17	CAP. 0.1MFD, 100V, 20% DISC	1001610 17
12	R7, R8	RES. 47K, 1/4W, 5%	1300202 2
13	R1, R2	RES. 490K, 1/4W, 5%	1300309 2
14	R4, R10	RES. 180K, 1/4W, 5%	1301322 2
15	R3, R5, R6, R9	RES. 1K, 1/4W, 5%	1300365 4

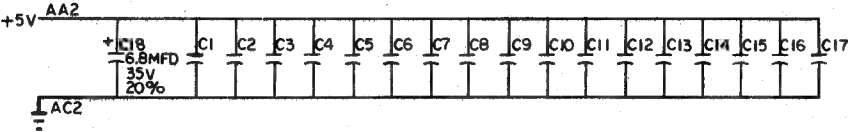
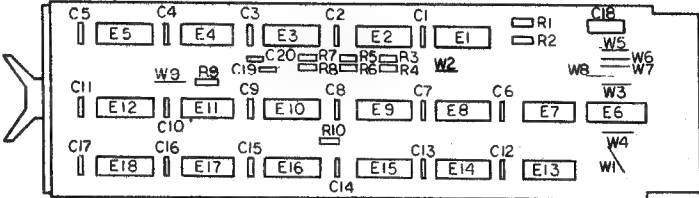
NOTES:

- VECTOR BIT JUMPERS MUST BE CUT FOR A "ZERO" AND MUST BE INSERTED FOR A "ONE".
- NPR JUMPER (W9) MUST BE CUT FOR SOME PDP-11 PROCESSORS; IF THE RIGHT HALF REQUEST CIRCUIT IS USED FOR NPR'S; OR IF PIN J1 IS NOT WIRED ON THE M7821 SLOT.
- DETAILS ON COMPONENTS ARE NOTED IN THE PARTS REFERENCE; PLACEMENT IS NOTED IN THE COMPONENT PLACEMENT DIAGRAM.
- GND AND +5V ARE USUALLY PIN 7 AND PIN 14, RESPECTIVELY. EXCEPTIONS ARE:

I.C. TYPE	GND	+5V
DEC 8640	PIN 1	PIN 8

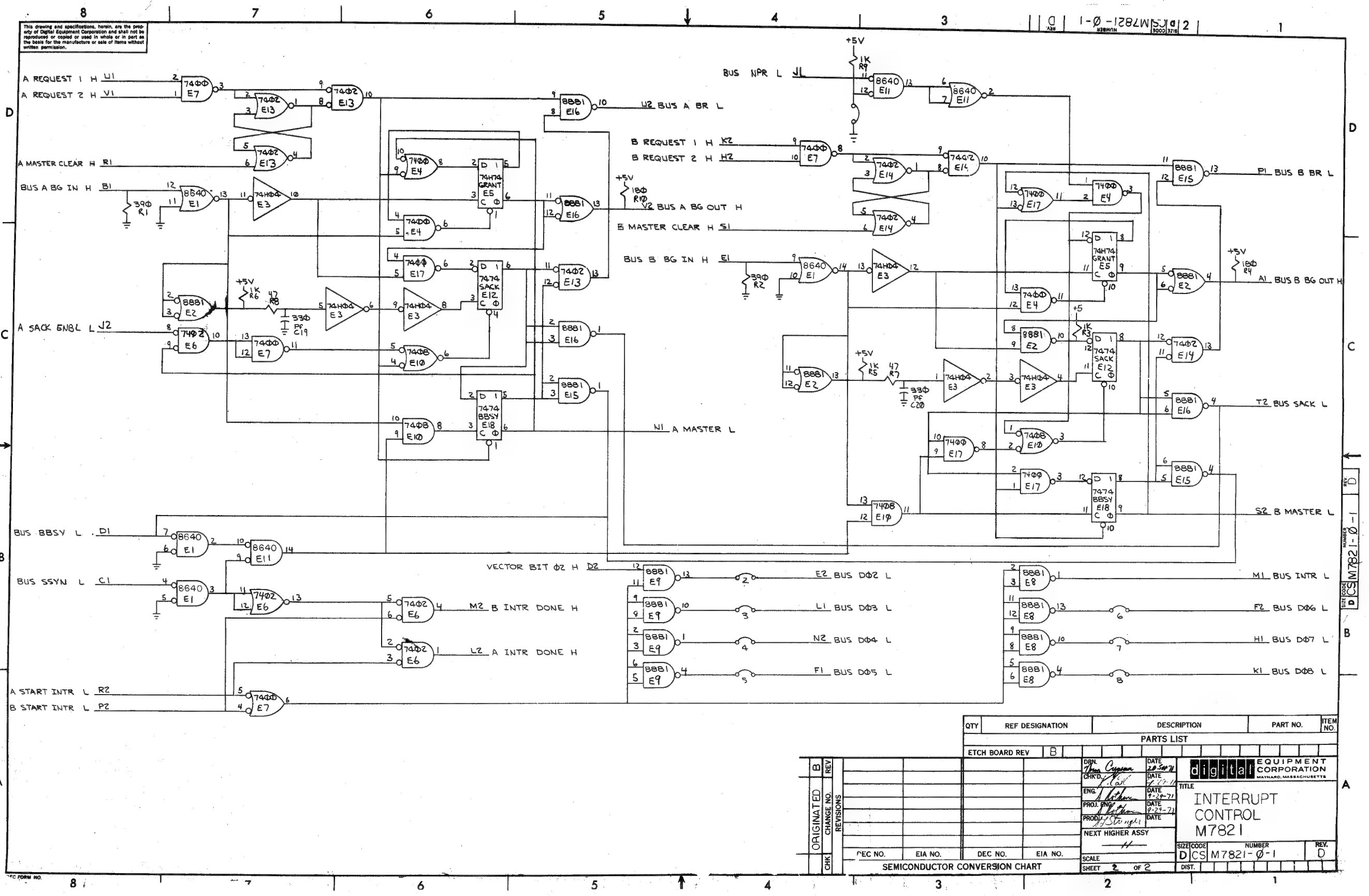
- UNLESS OTHERWISE NOTED RESISTANCE IS IN OHMS, CAPACITANCE IS IN PICO FARADS. CAPACITORS WITHOUT ANY NOTED VALUES ARE .01MFD.
- DEC 8640'S WERE PHASED IN AS 380 REPLACEMENTS. ANY 380 FAILURES SHOULD BE REPLACED BY 8640'S.

COMPONENT PLACEMENT



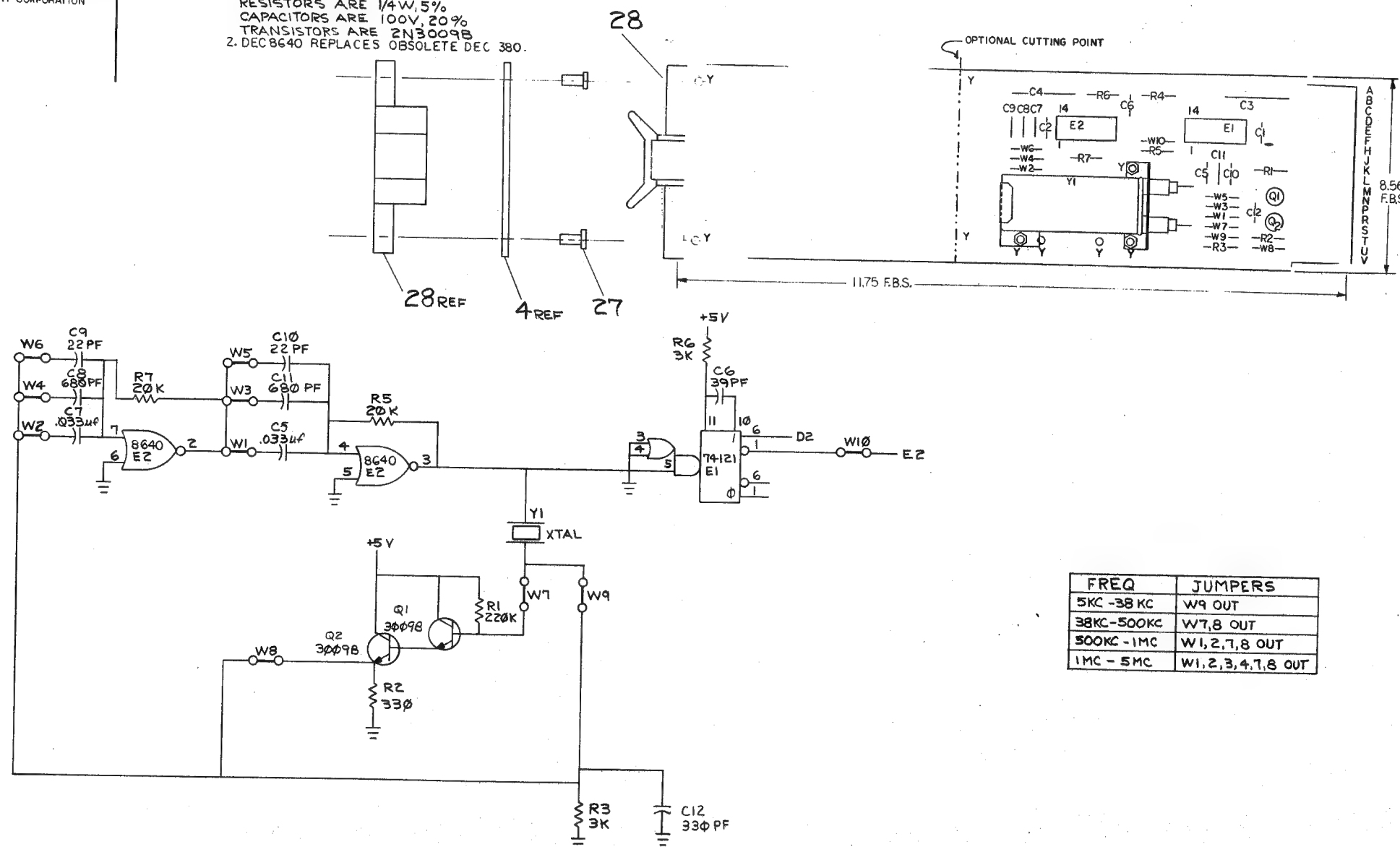
REV	CHG	NO.	REV
1	1	1	1
2	2	2	2
3	3	3	3
4	4	4	4
5	5	5	5
6	6	6	6
7	7	7	7
8	8	8	8
9	9	9	9
10	10	10	10
11	11	11	11
12	12	12	12
13	13	13	13
14	14	14	14
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16	16	16	16
17	17	17	17
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19	19	19	19
20	20	20	20
21	21	21	21
22	22	22	22
23	23	23	23
24	24	24	24
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26	26	26	26
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29	29	29	29
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39	39	39	39
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41	41	41	41
42	42	42	42
43	43	43	43
44	44	44	44
45	45	45	45
46	46	46	46
47	47	47	47
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90	90	90	90
91	91	91	91
92	92	92	92
93	93	93	93
94	94	94	94
95	95	95	95
96	96	96	96
97	97	97	97
98	98	98	98
99	99	99	99
100	100	100	100

FIRST USED ON OPT/MOD 11/20		QTY.	DESCRIPTION	PART NO.	ITEM NO.
UNLESS OTHERWISE SPECIFIED DIMENSIONS IN INCHES TOLERANCES DECIMALS FRACTIONS ANGLES ± .005 ± 1/64 ± .030 FURNISH SURFACE QUALITY REMOVE BURRS AND BREAK SHARP CORNERS		DATE 11/20/71	DATE 11/20/71	DATE 11/20/71	DATE 11/20/71
MATERIAL FINISH		PARTS LIST digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS TITLE INTERRUPT CONTROL M7821 REV. D			
SCALE SHEET 1 OF 2		DISTRIBUTION DISTRIBUTION			



1. UNLESS OTHERWISE SPECIFIED,
RESISTORS ARE 1/4W, 5%
CAPACITORS ARE 100V, 20%
TRANSISTORS ARE 2N3009B

2. DEC8640 REPLACES OBSOLETE DEC 380



FREQ	JUMPERS
5KC - 38 KC	W9 OUT
38KC - 500KC	W7,8 OUT
500KC - 1MC	W1,2,7,8 OUT
1MC - 5MC	W1,2,3,4,7,8 OUT

		X-Y COORDINATE HOLE LOCATION	K-CO-M4050-B-4	1
		ASSY/DRILLING HOLE LAYOUT	D-AH-M4050-B-5	2
		MODULE ECO HISTORY	B-MH-M4050-B-6	3
1		ETCHED CIRCUIT BOARD	5010579	4
1	C6	CAP 39 PF 15V DM	1000010	5
1	C4	CAP 39 MF 10V 10% TANT	1000076	6
2	C8,C11	CAP 680 PF 100V D.M.	1000026	7
2	C1,C2	CAP .01 MF 100V 20% DISC	1001610	8
1	C3	CAP 6.8 MF 35V 10% TANT	1005306	9
2	C7,C5	CAP .033 MF 25V X% DISC	1010873	10
2	C9,C10	CAP 22 PF 100V 5% D.M.	1005820	11
1	R2	RES 330 1/4W 5%	1300295	12
2	R6,R3	RES 3K 1/4W 5%	1300432	13
2	R5,R7	RES 20K 1/4W 5%	1302391	14
1	R4	RES 10 1/4W 5%	1301317	15
1	R1	RES 220K 1/4W 5%	1302082	16
2	Q1,Q2	TRANS DEC 30090	1503100	17
1	E2	I.C. DEC 8640	1911469	18
1	E1	I.C. DEC 74121	1910230	19
1		BRACKET, CRYSTAL HOLDER	5303154	20
1		BRACKET, REAR SUPPORT	5302825	21
3		NUT HEX #2-56	9006555	22
3		SCREW, PH #2-56X 1/4	9006001-1	23
1	Y1	CRYSTAL (CUSTOMER WILL SPECIFY)		24
2		CRYSTAL SOCKET	1202812	25
10	W1 THRU W10	BUSS WIRE	9107560-01	26
2		EYELET (GS4-7 STIMPSON)	9806732	27
1		HANDLE-MAGENTA	9008337-06	28
1	C12	330 PF 100V 5 %	1000023	29

QTY	REF DESIGNATION	DESCRIPTION	PART NO.	ITEM NO.
PARTS LIST				
ETCH BOARD REV	D			
		DRN. <i>Dullman</i>	DATE <i>9/10/73</i>	digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS TITLE CRYSTAL CLOCK
		CHK'D. <i>mbaine</i>	DATE <i>10/10/73</i>	
		ENG. <i>S. Schumacher</i>	DATE <i>10-16-73</i>	
		PROJ. ENG. <i>S. Schumacher</i>	DATE <i>10-16-73</i>	
		PROD. <i>R. Will</i>	DATE <i>10-23-73</i>	
		NEXT HIGHER ASSY <i>+</i>		
DEC NO.	EIA NO.	SCALE <i>NONE</i>	SIZE CODE D CS	NUMBER M4050-0-1
CONVERSION CHART		SHEET <i>1</i> OF <i>1</i>	DIST.	REV. E

M. F. Anglick		S. SHAMMAS		ETCH BOARD REV	
H. G. Gammare 12-3-74		M. 4050 - 00002		E	
S. SHAMMAS		S. SHAMMAS		H. Gammare 11-28-73	
M. 4050 - 00001		ORIGINATED		C	
CHG		CHANGE NO.		REV	
REVISIONS					
DEC 3009-B		ZN3646			
DEC NO.		EIA NO.		DEC NO.	
EIA NO.					
SEMICONDUCTOR CONVERSION CHART					

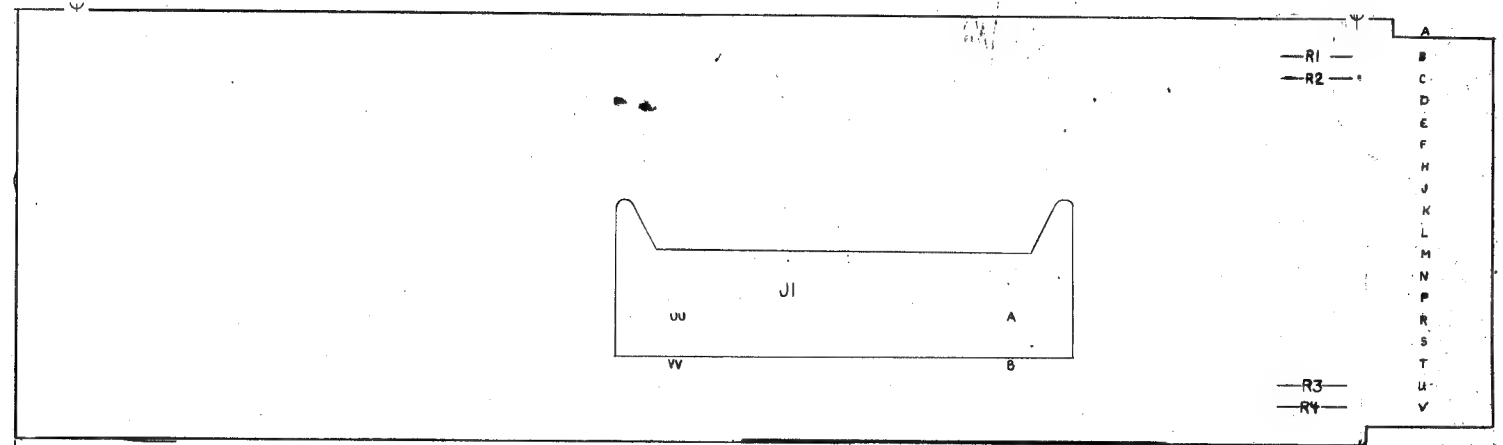
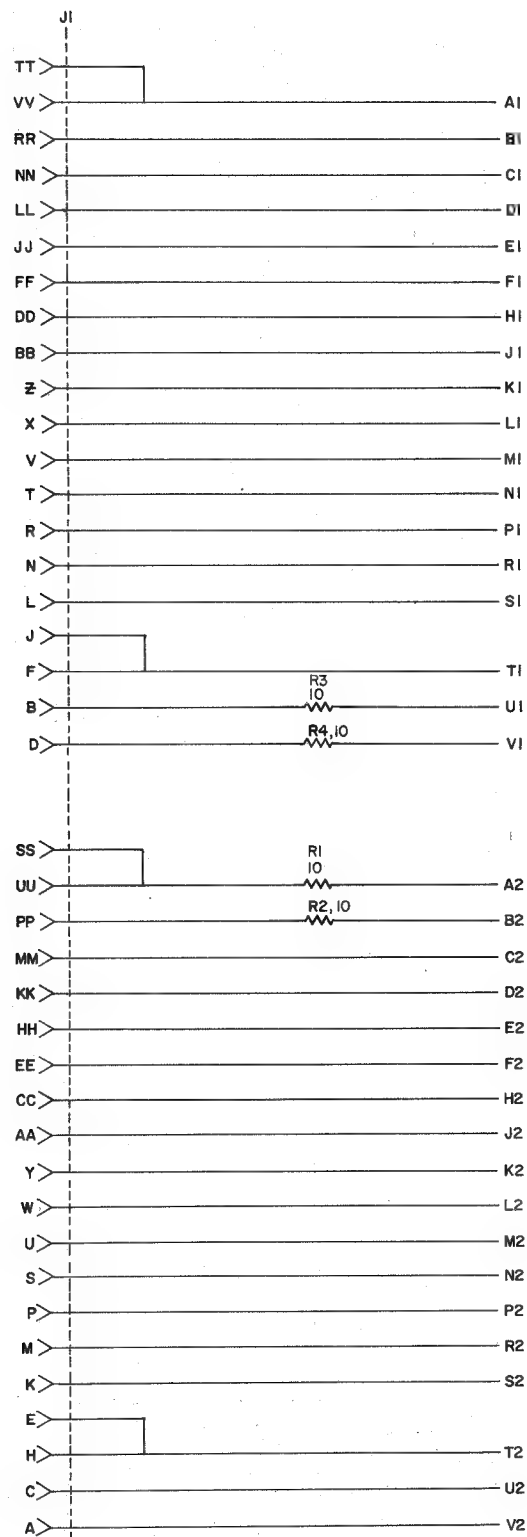
IC TYPE	GND	+ 5V
DEC IC 8640	1	8

GND AND 5V ARE USUALLY PIN 7 AND 14 RESPECTIVELY EXCEPTIONS ARE STATED ABOVE

IC PIN LOCATIONS

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REV. 1
NUMBER 1-0-1
DATE 9/30/71
BY 134



REVISIONS		TRANSISTOR & DIODE CONVERSION CHART		TITLE	
REV.	NO.	DEC	EIA	SIZE	CODE
1	1	DEC	EIA	D	CS
2	2	DEC	EIA	NUMBER	REV.
3	3	DEC	EIA	1300170	A
4	4	DEC	EIA	1209941	1
5	5	DEC	EIA	5009754	2
6	6	DEC	EIA	B-MH-M971-0-6	3
7	7	DEC	EIA	D-AH-M971-0-5	4
8	8	DEC	EIA	K-00-M971-0-4	1
9	9	DEC	EIA	DEC PART NO.	1300170
10	10	DEC	EIA	DESCRIPTION	1300170
11	11	DEC	EIA	REF. DESIGNATION	1300170
12	12	DEC	EIA	QTY.	1300170
13	13	DEC	EIA	PARTS LIST	1300170
14	14	DEC	EIA	DATE	1300170
15	15	DEC	EIA	BY	1300170
16	16	DEC	EIA	CHKD	1300170
17	17	DEC	EIA	APP'D	1300170
18	18	DEC	EIA	DATE	1300170
19	19	DEC	EIA	DATE	1300170
20	20	DEC	EIA	DATE	1300170

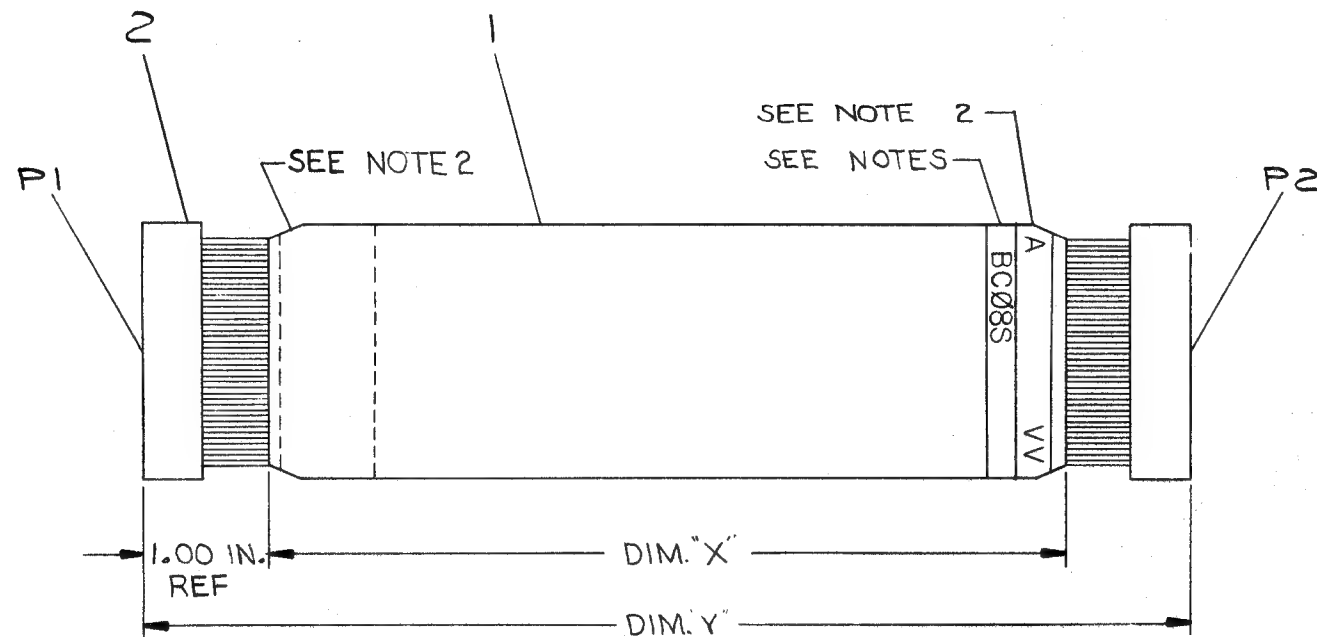
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LEGEND

NUMBER	DIM. X VAR.	DIM. Y REF
BCØ8S-1	10.00 IN. ± 1.00 IN.	1.00 FT. ± 1.00 IN.
BCØ8S-15	15.0 FT. ± 5.00 IN.	15 FT. 2 IN. ± 5.00 IN.
BCØ8S-25	25.0 FT. ± 3 IN.	25 FT. 2 IN. ± 3 IN.
BCØ8S-2K	2.0 FT 9 IN. ± 1.0 IN.	2.0 FT. 11 IN. ± 1.0 IN.
BCØ8S-1Ø	1Ø.Ø FT. ± 2 IN.	1Ø FT. 2 IN. ± 2 IN.
BCØ8S-7	7.Ø FT. ± 2 IN.	7 FT. 2 IN. ± 2 IN.
BCØ8S-1B	14 IN. ± 1 IN.	16 IN. ± 1 IN.
BCØ8S-5L	70 IN. ± 1.5 IN.	72 IN. ± 1.5 IN.

NOTES:

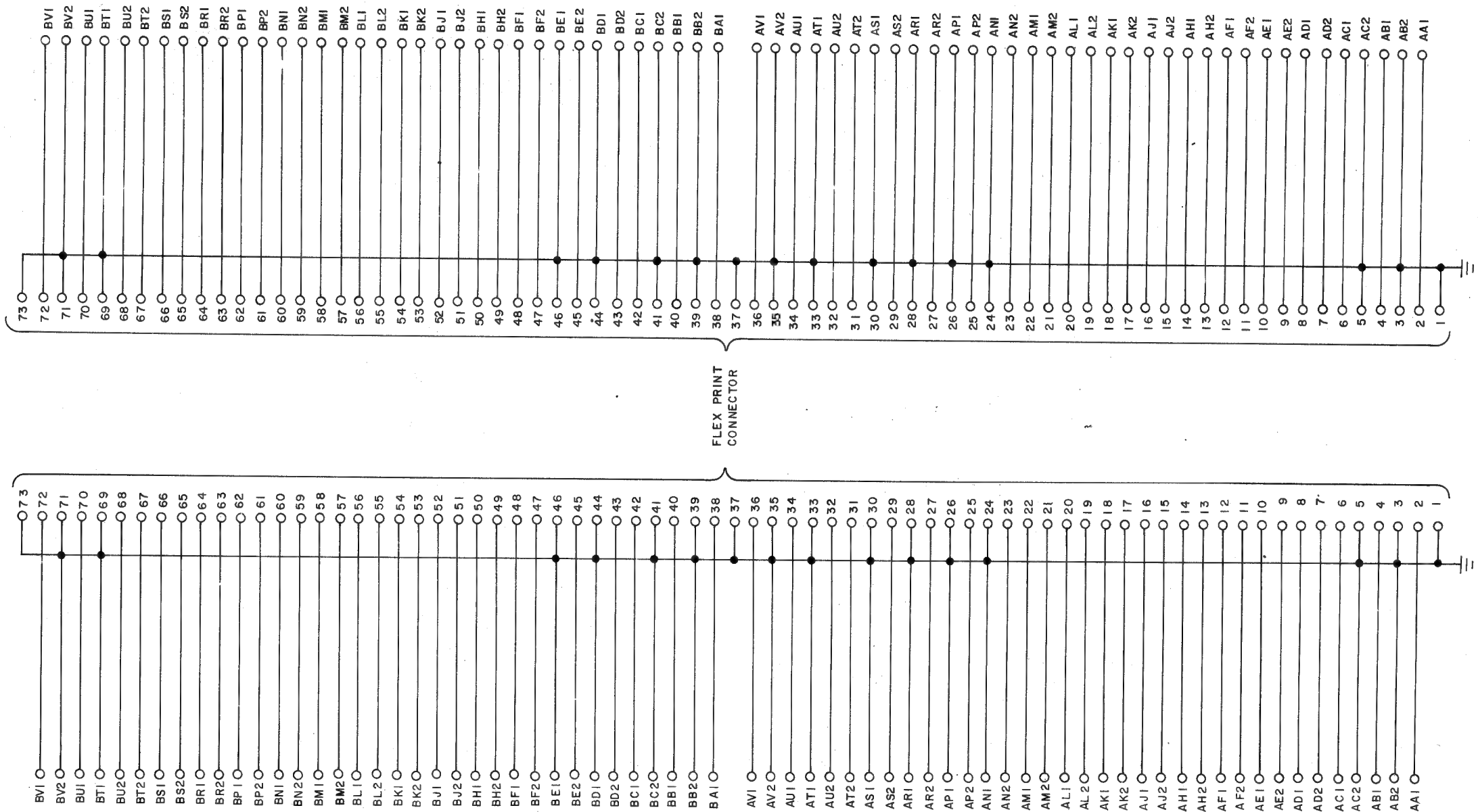
1. CONNECTORS P1 AND P2 ARE TO BE WIRED POINT TO POINT.
2. CONNECTOR LEGEND IDENTIFICATION TO BE PLACED ON SHIELD SIDE OF CABLE AT ONE END, AND WIRE SIDE OF CABLE ON THE OTHER END.
3. MUST BE ASSEMBLED TO PROCESS SPECIFICATION 76-06485-0-0.
4. INSPECTION AND TEST STAMPS TO BE PLACED AT EACH END OF THE CABLE ASSEMBLY.
5. THE NUMBER BCØ8S MUST BE ON THE CABLE IN CONJUNCTION WITH CONNECTOR LEGEND IDENTIFICATION.



REV.	CHANGE NO.	DESCRIPTION
A	BCØ8S-00001	THIS DWG WAS 7008418-0-0
B	BCØ8S-00002	12-2-71
C	BCØ8S-00003	12-2-71
D	BCØ8S-00004	1-3-72
E	BCØ8S-00005	2-26-74
F	BCØ8S-00006	5-10-74
G	BCØ8S-00007	8-30-74
H	BCØ8S-00008	9-4-74
I	BCØ8S-00009	6-9-75
J	BCØ8S-00010	6-11-75
K	LA36-00112	6-26-76
L	LA36-00112	6-26-75

FIRST USED ON OPTION/MODEL		L AB8-E	
QTY.	DESCRIPTION	PART NO.	ITEM NO.
2	CONNECTOR 40 SOCKET	1211206	2
A/R	CABLE, FLAT 40 COND	1700004	1
PARTS LIST			
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES. TOLERANCES		DRN. <i>J. Ferguson</i> DATE 5-12-74 CHK'D <i>J. G. Gribbe</i> DATE 5-13-71 ENG. <i>J. G. Gribbe</i> DATE 5-13-71 PROD. ENG. <i>J. G. Gribbe</i> DATE 5-13-71 PROD. <i>J. G. Gribbe</i> DATE 5-13-71	
DECIMALS .XXX = .005 .XX = .02 .X = .1		ANGLES ± 0° 30'	
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY ✓		TITLE I/O CABLE ASSY. (DIAG. JUMPER)	
MATERIAL + +		NEXT HIGHER ASSY.	
FINISH + +		SCALE NONE	
SHEET 1 OF 1		DIST. <i>G</i>	
SIZE CODE C IA		NUMBER BCØ8S-Ø-Ø	
REV. K			

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REVISIONS	
CHK	CHG NO. REV.
1	00001 A
2	00002 B

DEC FORM NO.
DR0-102

DRN	DATE
CHK'D	DATE
ENG	DATE
PROD.	DATE

DATE	11-6-69
DATE	11-6-69
DATE	7-17-70
DATE	3-26-70

TRANSISTOR & DIODE CONVERSION CHART			
DEC	EIA	DEC	EIA

digital
EQUIPMENT
CORPORATION
MAYNARD, MASSACHUSETTS

TITLE			
INTERNAL BUS CONNECTOR			
M920			
SIZE	CODE	NUMBER	REV.
C	CS	M920-0-1	B
PRINTED CIRCUIT REV.			
B			

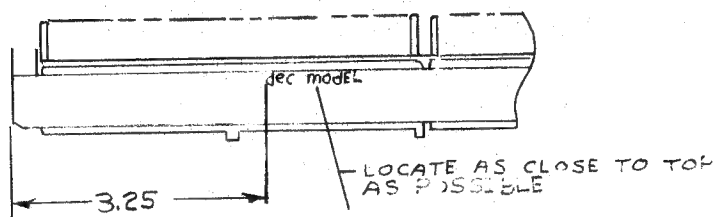
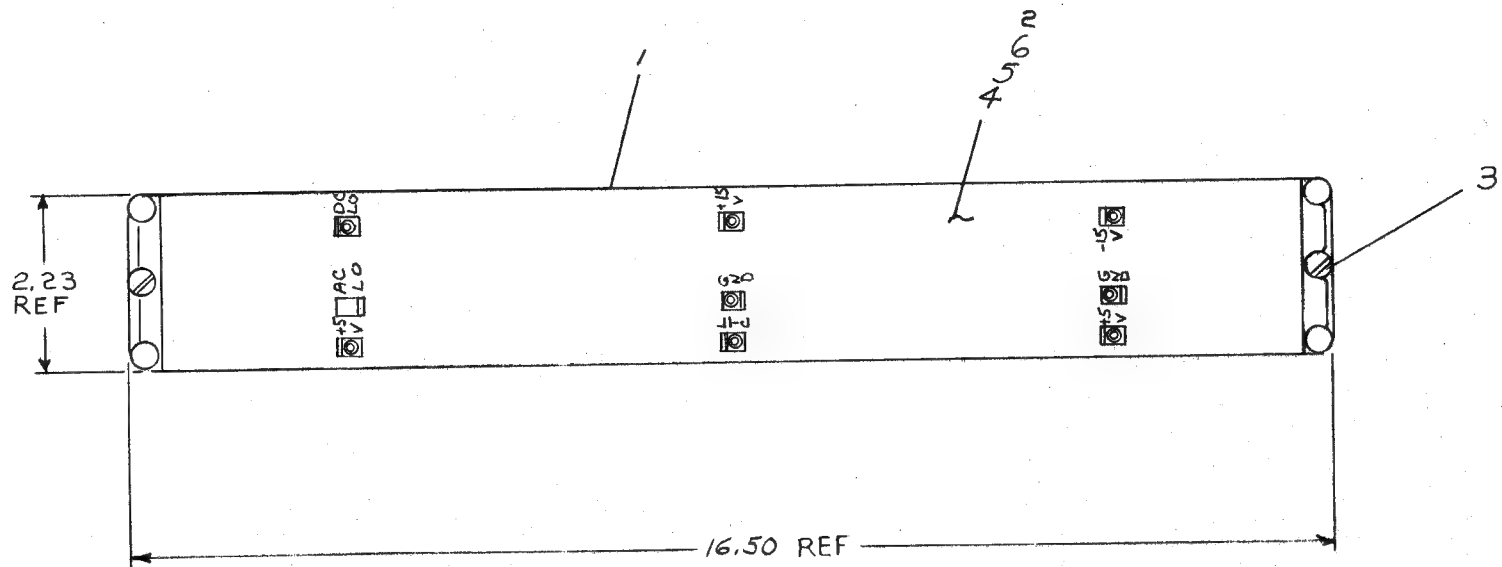
SIZE	CODE	NUMBER	REV.
C	CS	M920-0-1	B

DIST. 3-24-70 1253

PINK

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WIRE TABLE FOR DQ11-AA					
ITEM NO	SIGNAL NAME	FROM PIN	TO PIN	COLOR	AWG
5	-15	DQ1 B2	WIRE WRAP PIN A -15 V LUG	BLU	# 24
4	+15	DQ1 N2	WIRE WRAP AT +15 V LUG	ORG	# 24
6	BUS AC LO	BQ1 F1	WIRE WRAP PIN AT AC LO LUG	YEL	# 30
6	BUS DC LO	BQ1 F2	WIRE WRAP PIN AT DC LO LUG	YEL	# 30
7	TIME OUT(1)H	BQ2 C1	EQ4 S2	WHITE	#30 TWP
	GND	BQ2 C2	EQ4 T1	BLK	



REV.	CHANGE NO.	REV.
A	DQ11AA-00003	4-14-75
B	DQ11-00003	4-16-75
C	DQ11-00003	8-21-75
D	DQ11-00003	8-22-75

DEC FORM NO.
DRC 100-B

4

3

2

1

FIRST USED ON OPTION/MODEL DQ11	QTY.	DESCRIPTION	PART NO.	ITEM NO.
PARTS LIST				
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES	DRN. <i>E. Wilson</i>	DATE <i>5/21/73</i>	digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS	
TOLERANCES	CHK'D <i>See Page</i>	DATE <i>12/1/72</i>	TITLE WIRED ASS'Y (DQ11-AA)	
DECIMALS	ENG. <i>R. Lisee</i>	DATE <i>12-10-73</i>	SIZE CODE C IA	
.xxx = .005	PROJ. ENG. <i>C. Lisee</i>	DATE <i>12-10-73</i>	NUMBER 7009467-0-0	
.xx = .02	PROD. <i>R. Wall</i>	DATE <i>12-11-73</i>	REV. B	
.x = .1	REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY V		DIST.	
MATERIAL + + +	NEXT HIGHER ASSY. A-PL-DQ11-0-0		REV.	
FINISH + + +	SCALE SHEET 1 OF 1		REV.	

REV.

NUMBER

SIZE CODE

B

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FIRST USED ON OPTION MODEL		QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11			PARTS LIST		
DRN.	<i>E. Wilson</i>	DATE	8/31/73		
CHK'D.	<i>[Signature]</i>	DATE	10/22/73		
ENG.	<i>Rene Lisee</i>	DATE	11/16/73		
PROJ. ENG.	<i>[Signature]</i>	DATE	11/16/73		
PROD.	<i>R. Davis</i>	DATE	11/21/73		
NEXT HIGHER ASSEMBLY			DAD-7009467-0-0		
SCALE			NONE		
SHEET			1 OF 1		
SIZE			K WL		
CODE			DQ11-0-12		
NUMBER			REV. D		
DIST.					

REVISIONS		REV.
CHK	CHANGE NO.	
<i>EM</i>	DQ11AA-00001	A
<i>E. Allain</i>	12-19-73	
<i>R. Lisee</i>	1-14-74	
<i>EM</i>	DQ11AA-00002	B
<i>S. Maderewicz</i>	1-22-74	
<i>R. Lisee</i>	2-25-74	
<i>EM</i>	DQ11AA-00003	C
<i>EM</i>	DQ11-00003	D

digital EQUIPMENT CORPORATION
MAYNARD, MASSACHUSETTS

TITLE
WIRE LIST
(DQ11-AA)

HND288.V23(23) 05/24/74										30-AUG-75		9:4		PAGE 1	
A/P		PIN	ORDER	BAY -	Q	DRAM	RV	PG	Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN
		NAME	PIN	ORDER											NUMBER
+15V		D01N2											1-PIN RUN		1
-15V		D01A1		1-01 *							1				2
-15V		D01B2		1-02 *											2
-15V				1									2-6/8		2
A01A2		A01A2		1-01 *		D01					1				3
A01A2		A04A2		1-02 *		D01									3
A01A2				1									3-6/8		3
B01A2		B01A2		1-01 *		D01					1				4
B01A2		B04A2		1-02 *		D01									4
B01A2				1									3-6/8		4
BUS A00		A03J1		1-01 *		D14.1					1				5
BUS A00		B04H2		1-02 *		D01					2				5
BUS A00		B01H2		1-03 *		D01					1				5
BUS A00		F01H2		1-04 *		D03									5
BUS A00				1									21-6/8		5
BUS A01		A03L1		1-01 *		D14.1					1				6
BUS A01		B04H1		1-02 *		D01					2		2-3		6
BUS A01		B01H1		1-03 *		D01					1		6-2		6
BUS A01		F01H1		1-04 *		D03									6
BUS A01				1									22-2/8		6
BUS A02		A03M1		1-01 *		D14.1					1				7
BUS A02		B04J2		1-02 *		D01					2				7
BUS A02		B01J2		1-03 *		D01					1				7
BUS A02		F01F1		1-04 *		D03									7
BUS A02				1									21-4/8		7
BUS A03		A03K1		1-01 *		D14.1					1				8
BUS A03		B04J1		1-02 *		D01					2		2-4		8
BUS A03		B01J1		1-03 *		D01					1				8
BUS A03		F01V2		1-04 *		D03									8
BUS A03				1									23-5/8		8
BUS A04		A03N1		1-01 *		D14.1					1				9
BUS A04		B04K2		1-02 *		D01					2				9
BUS A04		B01K2		1-03 *		D01					1				9
BUS A04		F01U2		1-04 *		D03									9
BUS A04				1									22-4/8		9

Q011AA.D	A/P	PIN NAME	ORDER PIN	BAY - ORDER	Q	DRAW RV PG Y	X	Z	REMARKS	30-AUG-75	LENGTH	EXCEPTIONS	914 RUN NUMBER
BUS A05	L	A03U1		1-01 *		D14.1		1					10
BUS A05	L	B04K1		1-02 *		D01		2					10
BUS A05	L	B01K1		1-03 *		D01		1					10
BUS A05	L	F01V1		1-04 *		D03							10
BUS A05				1						22-0/8			10
BUS A06	L	A03V1		1-01 *		D14.1		1					11
BUS A06	L	B04L2		1-02 *		D01		2					11
BUS A06	L	B01L2		1-03 *		D01		1					11
BUS A06	L	F01U1		1-04 *		D03							11
BUS A06				1						22-2/8			11
BUS A07	L	A03P1		1-01 *		D14.1		1					12
BUS A07	L	B04L1		1-02 *		D01		2					12
BUS A07	L	B01L1		1-03 *		D01		1					12
BUS A07	L	F01P2		1-04 *		D03							12
BUS A07				1						22-0/8			12
BUS A08	L	B04M2		1-01 *		D01		1					13
BUS A08	L	B03F1		1-02 *		D14.2		2					13
BUS A08	L	B01M2		1-03 *		D01		1					13
BUS A08	L	F01N2		1-04 *		D03							13
BUS A08				1						19-6/8			13
BUS A09	L	B03J1		1-01 *		D14.2		1					14
BUS A09	L	B04M1		1-02 *		D01		2					14
BUS A09	L	B01M1		1-03 *		D01		1		6-4			14
BUS A09	L	F01R1		1-04 *		D03							14
BUS A09				1						20-3/8			14
BUS A10	L	B04N2		1-01 *		D01		1					15
BUS A10	L	B03K1		1-02 *		D14.2		2					15
BUS A10	L	B01N2		1-03 *		D01		1					15
BUS A10	L	F01P1		1-04 *		D03							15
BUS A10				1						20-0/8			15
BUS A11	L	B04N1		1-01 *		D01		1					16
BUS A11	L	B03H1		1-02 *		D14.2		2					16
BUS A11	L	B01N1		1-03 *		D01		1		6-1			16
BUS A11	L	F01L1		1-04 *		D03							16
BUS A11				1						19-5/8			16
BUS A12	L	B04P2		1-01 *		D01		1					17
BUS A12	L	B03N1		1-02 *		D14.2		2					17
BUS A12	L	B01P2		1-03 *		D01		1					17
BUS A12	L	F01C1		1-04 *		D03							17
BUS A12				1						18-0/8			17

DO11AA.D	HND288.V23(23) 05/24/74	30-AUG-75	914	PAGE 3		
RUN NAME	A/P PIN ORDER PIN	Q DRAW RV PG Y X Z	REMARKS	LENGTH	EXCEPTIONS	RUN NUMBER
BUS A13	L B04P1	1-01 *	D01	1		18
BUS A13	L R03S1	1-02 *	D14.2	2		18
BUS A13	L B01P1	1-03 *	D01	1		18
BUS A13	L F01K2	1-04 *	D03			18
BUS A13		1			19-0/8	18
BUS A14	L R04R2	1-01 *	D01	1		19
BUS A14	L B03R1	1-02 *	D14.2	2		19
BUS A14	L B01R2	1-03 *	D01	1		19
BUS A14	L F01K1	1-04 *	D03			19
BUS A14		1			18-4/8	19
BUS A15	L R04R1	1-01 *	D01	1		20
BUS A15	L B03P1	1-02 *	D14.2	2		20
BUS A15	L B01R1	1-03 *	D01	1		20
BUS A15	L F01D2	1-04 *	D03			20
BUS A15		1			18-0/8	20
BUS A16	L R01S2	1-01 *	D01	1		21
BUS A16	L B04S2	1-02 *	D01	2		21
BUS A16	L C03H2	1-03 *	D14.2	1		21
BUS A16	L F01E2	1-04 *	D03			21
BUS A16		1			18-2/8	21
BUS A17	L B04S1	1-01 *	D01	1		22
BUS A17	L B01S1	1-02 *	D01	2		22
BUS A17	L C03C1	1-03 *	D14.2	1		22
BUS A17	L F01D1	1-04 *	D03			22
BUS A17		1			18-2/8	22
BUS AC LO	L B01F1	1-01 *	D01	1		23
BUS AC LO	L B04F1	1-02 *	D01			23
BUS AC LO		1			3-6/8	23
BUS BBSY	L A01P2	1-01 *	D01	2		24
BUS BBSY	L A04P2	1-02 *	D01	1		24
BUS BBSY	L C04D1	1-03 *	D03			24
BUS BBSY		1			10-5/8	24
BUS BG 04 IN	H B01E2	1-01 *	D14.5	1		25
BUS BG 04 IN	H F03F1	1-02 *	D14.5			25
BUS BG 04 IN		1			13-2/8	25
BUS BG 04 OUT	H B04E2	1-01 *	D14.5	1		26
BUS BG 04 OUT	H F03F2	1-02 *	D14.5			26
BUS BG 04 OUT		1			13-2/8	26

HND288.V23(23) 05/24/74																			
DQ11AA.D		A/P	PIN	ORDER	PIN	ORDER	BAY -	Q	DRAW	RV	PG	Y	X	Z	REMARKS	30-AUG-75	9:14	EXCEPTIONS	RUN
RUN NAME		NAME		NAME		NAME		NAME		NAME		NAME		NAME		NAME		NUMBER	
BUS RG 05 IN	H	B01B1	1-01 *	D14.5	1									1					27
BUS RG 05 IN	H	F03E1	1-02 *	D14.5	1														27
BUS RG 05 IN																13-4/8			27
BUS RG 05 OUT	H	B04B1	1-01 *	D14.5	1									1					28
BUS RG 05 OUT	H	F03E2	1-02 *	D14.5	1														28
BUS RG 05 OUT																13-4/8			28
BUS EG 06 IN	H	B01A1	1-01 *	D14.5	1									1					29
BUS BG 06 IN	H	F03D1	1-02 *	D14.5	1														29
BUS BG 06 IN																13-6/8			29
BUS RG 06 OUT	H	B04A1	1-01 *	D14.5	1									1					30
BUS RG 06 OUT	H	F03D2	1-02 *	D14.5	1														30
BUS RG 06 OUT																13-2/8			30
BUS BG 07 IN	H	A01V1	1-01 *	D14.5	1									1					31
BUS BG 07 IN	H	F03B1	1-02 *	D14.5	1														31
BUS BG 07 IN																14-0/8			31
BUS RG 07 OUT	H	A04V1	1-01 *	D14.5	1									1					32
BUS RG 07 OUT	H	F03C1	1-02 *	D14.5	1														32
BUS RG 07 OUT																14-0/8			32
BUS BR 4	L	B01D2	1-01 *	D01	2									2					33
BUS BR 4	L	B04D2	1-02 *	D01	1														33
BUS BR 4	L	E03V1	1-03 *	D14.5	1														33
BUS BR 4																16-0/8			33
BUS BR 5	L	B01C1	1-01 *	D01	2									2					34
BUS BR 5	L	B04C1	1-02 *	D01	1														34
BUS BR 5	L	E03U1	1-03 *	D14.5	1														34
BUS BR 5																15-6/8			34
BUS BR 6	L	A01U2	1-01 *	D01	2									2					35
BUS BR 6	L	A04U2	1-02 *	D01	1														35
BUS BR 6	L	E03V2	1-03 *	D14.5	1														35
BUS BR 6																17-0/8			35
BUS BR 7	L	A01T2	1-01 *	D01	2									2					36
BUS BR 7	L	A04T2	1-02 *	D01	1														36
BUS BR 7	L	E03U2	1-03 *	D14.5	1														36
BUS BR 7																17-0/8			36

HND288.V23(23) 05/24/74										30-AUG-75	9:4	PAGE 5					
A/P		PIN	ORDER	PIN	ORDER	Q	DRAW	RV	PG	Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN	
DQ11AA.D		NAME		NAME		NAME		NAME		NAME		NAME		NAME		NAME	
BUS C0	L	B04U2	1-01 *				D01					2				37	
BUS C0	L	B01U2	1-02 *				D01					1				37	
BUS C0	L	F01J2	1-03 *				D03							15-4/8		37	
BUS C0			1													37	
BUS C1	L	B01T2	1-01 *				D01					1				38	
BUS C1	L	B04T2	1-02 *				D01					2				38	
BUS C1	L	C03K2	1-03 *				D14.3					1				38	
BUS C1	L	F01F2	1-04 *				D03									38	
BUS C1			1											18-2/8		38	
BUS D00	L	A01C1	1-01 *				D01					2				39	
BUS D00	L	A02F1	1-02 *				D05					1				39	
BUS D00	L	A04C1	1-03 *				D01							6-6/8		39	
BUS D00			1													39	
BUS D01	L	A01D2	1-01 *				D01					2				40	
BUS D01	L	A02F2	1-02 *				D05					1				40	
BUS D01	L	A04D2	1-03 *				D01							6-4/8		40	
BUS D01			1													40	
BUS D02	L	A01D1	1-01 *				D01					1				41	
BUS D02	L	A04D1	1-02 *				D01					2				41	
BUS D02	L	A02P2	1-03 *				D05					1		3-3		41	
BUS D02	L	C04E2	1-04 *				D03									41	
BUS D02			1											14-7/8		41	
BUS D03	L	A04E2	1-01 *				D01					1				42	
BUS D03	L	A01E2	1-02 *				D01					2				42	
BUS D03	L	A02R1	1-03 *				D05					1		3-5		42	
BUS D03	L	C04L1	1-04 *				D03									42	
BUS D03			1											15-3/8		42	
BUS D04	L	A01E1	1-01 *				D01					1				43	
BUS D04	L	A02H2	1-02 *				D05					2				43	
BUS D04	L	A04E1	1-03 *				D01					1				43	
BUS D04	L	C04N2	1-04 *				D03									43	
BUS D04			1											15-2/8		43	
BUS D05	L	A01F2	1-01 *				D01					1				44	
BUS D05	L	A02H1	1-02 *				D05					2				44	
BUS D05	L	A04F2	1-03 *				D01					1		3-6		44	
BUS D05	L	C04F1	1-04 *				D03									44	
BUS D05			1											14-3/8		44	

D011AA.D		HND288.V23(23) 05/24/74		PAGE 8	
RUN NAME	A/P	PIN NAME	ORDER PIN	BAY ORDER	NUMBER
BUS SACK	L	A01R2	1-01 *	D01	64
BUS SACK	L	A04R2	1-02 *	D01	64
BUS SACK	L	C04T2	1-03 *	D03	64
BUS SACK			1		64
BUS SSYN	L	B01U1	1-01 *	D01	65
BUS SSYN	L	B04U1	1-02 *	D01	65
BUS SSYN	L	C04C1	1-03 *	D03	65
BUS SSYN	L	D03U1	1-04 *	D14.4	65
BUS SSYN	L	F01V1	1-05 *	D03	65
BUS SSYN			1		65
CO	H	C01P2	1-01 *	D02	66
CO	H	D01H2	1-02 *	D02	66
CO			1		66
CS	H	C01K2	1-01 *	D02	67
CS	H	D01N2	1-02 *	D02	67
CS			1		67
D01R2		C01R2	1-01 *	D02	68
D01R2		D01R2	1-02 *	D02	68
D01R2			1		68
D01T2		C01E1	1-01 *	D02	69
D01T2		C01U2	1-02 *	D02	69
D01T2		D01T2	1-03 *	D02	69
D01T2			1		69
D01V1		C01E2	1-01 *	D02	70
D01V1		D01V1	1-02 *	D02	70
D01V1			1		70
D1-1 CO	H	D01A1	1-01 *	D01	71
D1-1 CO	H	E01A1	1-02 *	D13	71
D1-1 CO	H	E02V2	1-03 *	D06	71
D1-1 CO			1		71
D1-1 CS	H	D01P2	1-01 *	D01	72
D1-1 CS	H	E01B1	1-02 *	D13	72
D1-1 CS	H	E02U1	1-03 *	D06	72
D1-1 CS			1		72
D1-1 DS RBY	H	D01D2	1-01 *	D06	73
D1-1 DS RBY	H	E02K1	1-02 *	D06	73
D1-1 DS RBY			1		73

Q11AA.D	30-AUG-75	9:4	PAGE 9
RUN NAME	LENGTH	EXCEPTIONS	RUN NUMBER
A/P	PIN	NAME	ORDER
Q	DRAW	RV	PG Y X Z
REMARKS			
D1-1 RECEIVE DATA	L	D01D1	1-01 *
D1-1 RECEIVE DATA	L	E02E2	1-02 *
D1-1 RECEIVE DATA			1
D1-1 RING	H	D01C1	1-01 *
D1-1 RING	H	E02L2	1-02 *
D1-1 RING	H	E01U2	1-03 *
D1-1 RING			1
D1-1 SCR	H	D01H1	1-01 *
D1-1 SCR	H	E02D2	1-02 *
D1-1 SCR			1
D1-1 SCT	H	D01K1	1-01 *
D1-1 SCT	H	E02F1	1-02 *
D1-1 SCT			1
D1-1 SCTE	H	D01S1	1-01 *
D1-1 SCTE	H	D02V1	1-02 *
D1-1 SCTE			1
D2-1 BAIT	L	B02L1	1-01 *
D2-1 BAIT	L	E01S1	1-02 *
D2-1 BAIT			1
D2-1 DATA SET IE (1)	H	E01J1	1-01 *
D2-1 DATA SET IE (1)	H	F02D2	1-02 *
D2-1 DATA SET IE (1)			1
D2-1 DATA SET INTR (1)	H	E01S2	1-01 *
D2-1 DATA SET INTR (1)	H	E02U1	1-02 *
D2-1 DATA SET INTR (1)			1
D2-1 DATA TERM RDY	H	D01P2	1-01 *
D2-1 DATA TERM RDY	H	E01L2	1-02 *
D2-1 DATA TERM RDY			1
D2-1 DS INTR	L	D03R2	1-01 *
D2-1 DS INTR	L	E01N2	1-02 *
D2-1 DS INTR			1
D2-1 DTR (1)	H	E01H1	1-01 *
D2-1 DTR (1)	H	E02V1	1-02 *
D2-1 DTR (1)			1

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DO11AA.D		A/P		PIN		NAME		ORDER		PIN		BAY -		Q		DRAW		RV		PG		Y		X		Z		REMARKS		LENGTH		EXCEPTIONS		RUN		
RUN NAME																																		NUMBER		
D4-1	D05	H	B02D2						1-01 *								D05																	105		
D4-1	D05	H	B03C1						1-02 *								D14.4																	105		
D4-1	D05								1																										105	
D4-1	D06	H	A02J1						1-01 *								D05																	106		
D4-1	D06	H	B03D1						1-02 *								D14.1																	106		
D4-1	D06								1																										106	
D4-1	D07	H	A02B1						1-01 *								D05																	107		
D4-1	D07	H	B03B1						1-02 *								D14.1																	107		
D4-1	D07								1																										107	
D4-2	D08	H	A02E1						1-01 *								D06																	108		
D4-2	D08	H	B03M1						1-02 *								D14.2																	108		
D4-2	D08	H	E01E1						1-03 *								D13																	108		
D4-2	D08								1																										108	
D4-2	D09	H	A02D1						1-01 *								D06																	109		
D4-2	D09	H	B03P2						1-02 *								D14.2																	109		
D4-2	D09	H	E01M2						1-03 *								D13																	109		
D4-2	D09								1																										109	
D4-2	D10	H	B03R2						1-01 *								D14.2																	110		
D4-2	D10	H	C02R1						1-02 *								D06																	110		
D4-2	D10								1																										110	
D4-2	D11	H	B03N2						1-01 *								D14.2																	111		
D4-2	D11	H	C02P1						1-02 *								D06																	111		
D4-2	D11								1																										111	
D4-2	D12	H	C02P2						1-01 *								D06																	112		
D4-2	D12	H	C03B1						1-02 *								D14.2																	112		
D4-2	D12								1																										112	
D4-2	D13	H	C03E2						1-01 *								D14.2																	113		
D4-2	D13	H	C02M1						1-02 *								D06																	113		
D4-2	D13	H	E01P2						1-03 *								D13																	113		
D4-2	D13								1																										113	
D4-2	D14	H	C03F2						1-01 *								D14.2																	114		
D4-2	D14	H	C02M2						1-02 *								D06																	114		
D4-2	D14	H	E01R2						1-03 *								D13																	114		
D4-2	D14								1																										114	
D4-2	D14																																			114

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RUN NAME	LENGTH	EXCEPTIONS	RUN NUMBER
D4-2 D15			115
D4-2 D15			115
D4-2 D15			115
D4-2 D15	11-6/8		115
D4-3 AB MUX SEL			116
D4-3 AB MUX SEL	2-2		116
D4-3 AB MUX SEL	5-1/8		116
D4-3 BCC 24-16 (1)			117
D4-3 BCC 24-16 (1)			117
D4-3 BCC 24-16 (1)	4-4/8		117
D4-3 BITS 08 (1)			118
D4-3 BITS 08 (1)			118
D4-3 BITS 08 (1)	5-6/8		118
D4-3 BITS 09 (1)			119
D4-3 BITS 09 (1)			119
D4-3 BITS 09 (1)	5-2/8		119
D4-3 BITS 10 (1)			120
D4-3 BITS 10 (1)			120
D4-3 BITS 10 (1)	4-4/8		120
D4-3 BITS 11 (1)			121
D4-3 BITS 11 (1)			121
D4-3 BITS 11 (1)	11-2/8		121
D4-3 BITS 11 (1)			121
D4-3 RX CLOCK			122
D4-3 RX CLOCK			122
D4-3 RX CLOCK			122
D4-3 RX CLOCK	10-4/8		122
D4-3 SERIAL CLK EXT			123
D4-3 SERIAL CLK EXT			123
D4-3 SERIAL CLK EXT	2-6/8		123
D4-3 SERIAL DATA IN			124
D4-3 SERIAL DATA IN			124
D4-3 SERIAL DATA IN	5-6/8		124
D4-3 SRL CLK TRANS EXT			125
D4-3 SRL CLK TRANS EXT	3-3		125
D4-3 SRL CLK TRANS EXT			125
D4-3 SRL CLK TRANS EXT	7-3/8		125

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RUN NAME				NAME																	
D4-5	RD11	H		F02N1			1-01 *			D10					1						149
D4-5	RD11	H		F04K2			1-02 *			D04											149
D4-5	RD11							1									3-6/8				149
D4-5	RD12	H		F02V1			1-01 *			D10					1						150
D4-5	RD12	H		F04F2			1-02 *			D04											150
D4-5	RD12							1									4-4/8				150
D4-5	RD13	H		F02R2			1-01 *			D10					1						151
D4-5	RD13	H		F04H2			1-02 *			D04											151
D4-5	RD13							1									3-4/8				151
D4-5	RD14	H		F02P1			1-01 *			D10					1						152
D4-5	RD14	H		F04D2			1-02 *			D04											152
D4-5	RD14							1									4-2/8				152
D4-5	RD15	H		F02U1			1-01 *			D10					1						153
D4-5	RD15	H		F04E2			1-02 *			D04											153
D4-5	RD15							1									4-4/8				153
D4-5	RX BCC DATA IN	L		D04E1			1-01 *			D04					1						154
D4-5	RX BCC DATA IN	L		F02N2			1-02 *			D10											154
D4-5	RX BCC DATA IN							1									8-6/8				154
D4-5	TD 00	H		R02P2			1-01 *			D10					1						155
D4-5	TD 00	H		E04A1			1-02 *			D04											155
D4-5	TD 00							1									9-0/8				155
D4-5	TD 01	H		R02U2			1-01 *			D10					1						156
D4-5	TD 01	H		E04C1			1-02 *			D04											156
D4-5	TD 01							1									8-6/8				156
D4-5	TD 02	H		R02S1			1-01 *			D10					1						157
D4-5	TD 02	H		E04D1			1-02 *			D04											157
D4-5	TD 02							1									9-2/8				157
D4-5	TD 03	H		R02V1			1-01 *			D10					1						158
D4-5	TD 03	H		E04E1			1-02 *			D04											158
D4-5	TD 03							1									9-1/8				158
D4-5	TD 04	H		R02U1			1-01 *			D10					1						159
D4-5	TD 04	H		E04F1			1-02 *			D04											159
D4-5	TD 04							1									9-2/8				159
D4-5	TD 05	H		R02V2			1-01 *			D10					1						160
D4-5	TD 05	H		E04H1			1-02 *			D04											160
D4-5	TD 05							1									9-0/8				160

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D011AA.D		A/P		ORDER		PIN		BAY -		ORDER		Q		DRAW RV PG Y		X		Z		REMARKS		30-AUG-75		914		LENGTH		EXCEPTIONS		RUN		NUMBER	
RUN NAME																																	
D4-5	TD 06	H		B02K1		1-01 *		D10																								161	
D4-5	TD 06	H		E04J1		1-02 *		D04																								161	
D4-5	TD 06					1																										161	
D4-5	TD 07	H		R02H2		1-01 *		D10																								162	
D4-5	TD 07	H		E04K1		1-02 *		D04																								162	
D4-5	TD 07					1																										162	
D4-5	TD 08	H		R02R2		1-01 *		D10																								163	
D4-5	TD 08	H		F04C1		1-02 *		D04																								163	
D4-5	TD 08					1																										163	
D4-5	TD 09	H		B02H1		1-01 *		D10																								164	
D4-5	TD 09	H		F04D1		1-02 *		D04																								164	
D4-5	TD 09					1																										164	
D4-5	TD 10	H		B02S2		1-01 *		D10																								165	
D4-5	TD 10	H		F04E1		1-02 *		D04																								165	
D4-5	TD 10					1																										165	
D4-5	TD 11	H		R02T2		1-01 *		D10																								166	
D4-5	TD 11	H		F04F1		1-02 *		D04																								166	
D4-5	TD 11					1																										166	
D4-5	TD 12	H		R02R1		1-01 *		D10																								167	
D4-5	TD 12	H		F04H1		1-02 *		D04																								167	
D4-5	TD 12					1																										167	
D4-5	TD 13	H		R02P1		1-01 *		D04																								168	
D4-5	TD 13	H		F04J1		1-02 *		D04																								168	
D4-5	TD 13					1																										168	
D4-5	TD 14	H		C02V2		1-01 *		D10																								169	
D4-5	TD 14	H		F04K1		1-02 *		D04																								169	
D4-5	TD 14					1																										169	
D4-5	TD 15	H		B02N2		1-01 *		D10																								170	
D4-5	TD 15	H		F04L1		1-02 *		D04																								170	
D4-5	TD 15					1																										170	
D4-6	EE 13 (1)	H		A02U1		1-01 *		D11																								171	
D4-6	EE 13 (1)	H		C03N2		1-02 *		D14.2																								171	
D4-6	EE 13 (1)					1																										171	
D4-6	EE 14 (1)	H		A02E2		1-01 *		D11																								172	
D4-6	EE 14 (1)	H		C03N1		1-02 *		D14.2																								172	
D4-6	EE 14 (1)					1																										172	
D4-6	EE 14 (1)																																172

DOLIAA.D RUN NAME	A/P	PIN ORDER NAME PIN	BAY - ORDER	HND289.V23(23) 05/24/74	Q DRAW RV PG Y X Z REMARKS	30-AUG-75 LENGTH	914 EXCEPTIONS	PAGE 1 RUN NUMBER
D4-6 REG PT08 (1)	H	C03R2	1-01 *					173
D4-6 REG PT08 (1)	H	F02B1	1-02 *		D14.4 D11	9-2/8		173
D4-6 REG PT08 (1)			1					173
D4-6 REG PT09 (1)	H	C03P2	1-01 *			4-5		174
D4-6 REG PT09 (1)	H	F02C1	1-02 *		D14.4 D11	9-7/8		174
D4-6 REG PT09 (1)			1					174
D4-6 REG PT10 (1)	H	C03R1	1-01 *			3-5		175
D4-6 REG PT10 (1)	H	E02N1	1-02 *		D14.4 D11	7-7/8		175
D4-6 REG PT10 (1)			1					175
D4-6 REG PT11 (1)	H	B03L2	1-01 *			5-1		176
D4-6 REG PT11 (1)	H	F02P1	1-02 *		D14.4 D11	10-7/8		176
D4-6 REG PT11 (1)			1					176
D4-7 RX SYNC DET	H	E03P1	1-01 *			2-0		177
D4-7 RX SYNC DET	H	F02E1	1-02 *		D14.8 D12			177
D4-7 RX SYNC DET	H	F04N2	1-03 *		D04	8-5/8		177
D4-7 RX SYNC DET			1					177
D4-7 SERIAL DATA OUT	L	D01V2	1-01 *					178
D4-7 SERIAL DATA OUT	L	E02R1	1-02 *		D02 D02	4-4/8		178
D4-7 SERIAL DATA OUT			1					178
D4-7 TX DATA	H	R02L2	1-01 *					179
D4-7 TX DATA	H	D04F1	1-02 *		D12 D04			179
D4-7 TX DATA	H	F03R2	1-03 *		D14.6	16-2/8		179
D4-7 TX DATA			1					179
D5-1 CC/BA 00	H	A03E2	1-01 *					180
D5-1 CC/BA 00	H	D02R2	1-02 *		D14.1 D05	11-6/8		180
D5-1 CC/BA 00			1					180
D5-1 CC/BA 01	H	A03D2	1-01 *					181
D5-1 CC/BA 01	H	E02B1	1-02 *		D14.1 D05	13-0/8		181
D5-1 CC/BA 01			1					181
D5-1 CC/BA 02	H	A03H2	1-01 *					182
D5-1 CC/BA 02	H	D02H2	1-02 *		D14.1 D05	10-4/8		182
D5-1 CC/BA 02			1					182
D5-1 CC/BA 03	H	A03F2	1-01 *					183
D5-1 CC/BA 03	H	D02D2	1-02 *		D14.1 D05	10-2/8		183
D5-1 CC/BA 03			1					183

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D5-1 CC/BA 04	H	A03R2		1-01 *		D14.1			1						184
D5-1 CC/BA 04	H	D02J1		1-02 *		D05									184
D5-1 CC/BA 04				1							10-0/8				184
D5-1 CC/BA 05	H	A03S1		1-01 *		D14.1			1						185
D5-1 CC/BA 05	H	D02N2		1-02 *		D14.1									185
D5-1 CC/BA 05				1							10-0/8				185
D5-1 CC/BA 06	H	A03T2		1-01 *		D14.1			1						186
D5-1 CC/BA 06	H	D02H1		1-02 *		D05									186
D5-1 CC/BA 06				1							9-4/8				186
D5-1 CC/BA 07	H	A03S2		1-01 *		D14.1			1			4-3			187
D5-1 CC/BA 07	H	D02A1		1-02 *		D05									187
D5-1 CC/BA 07				1											187
D5-1 CC/BA 08	L	C03H1		1-01 *		D14.2			1			2-5			188
D5-1 CC/BA 08	L	D04H1		1-02 *		D04									188
D5-1 CC/BA 08				1							5-7/8				188
D5-1 CC/BA 09	L	C03J2		1-01 *		D14.2			1			2-4			189
D5-1 CC/BA 09	L	D04J1		1-02 *		D04									189
D5-1 CC/BA 09				1							5-5/8				189
D5-1 CC/BA 10	L	C03F1		1-01 *		D14.2			1			2-6			190
D5-1 CC/BA 10	L	D04K1		1-02 *		D04									190
D5-1 CC/BA 10				1							6-1/8				190
D5-2 CC/BA 08	H	B03F2		1-01 *		D14.2			1						191
D5-2 CC/BA 08	H	D02M2		1-02 *		D06									191
D5-2 CC/BA 08				1							8-4/8				191
D5-2 CC/BA 09	H	B03E2		1-01 *		D14.2			1						192
D5-2 CC/BA 09	H	D02P1		1-02 *		D06									192
D5-2 CC/BA 09				1							9-0/8				192
D5-2 CC/BA 10	H	B03J2		1-01 *		D14.2			1			3-5			193
D5-2 CC/BA 10	H	D02D1		1-02 *		D06									193
D5-2 CC/BA 10				1							7-7/8				193
D5-2 CC/BA 11	H	B03H2		1-01 *		D14.2			1						194
D5-2 CC/BA 11	H	D02F2		1-02 *		D06									194
D5-2 CC/BA 11				1							7-6/8				194
D5-2 CC/BA 12	H	B03U2		1-01 *		D14.2			1						195
D5-2 CC/BA 12	H	D02F1		1-02 *		D06									195
D5-2 CC/BA 12				1							6-4/8				195

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RUN NAME	LENGTH	EXCEPTIONS	RUN NUMBER
A/P	PIN NAME	ORDER PIN	BAY - ORDER
HND288.V23(23)	05/24/74		
Q	DRAW RV PG Y	X	Z
REMARKS			
D5-4 01 TO TX S DONE	L	C02S2	1-01 *
D5-4 01 TO TX S DONE	L	D03M2	1-02 *
D5-4 01 TO TX S DONE	L	D03M2	1
D5-4 BSSYN	H	D03L2	1-01 *
D5-4 BSSYN	H	E04U2	1-02 *
D5-4 BSSYN	H	E04U2	1
D5-4 CLOCK LOSS SH CNT	H	D03M1	1-01 *
D5-4 CLOCK LOSS SH CNT	H	F02D1	1-02 *
D5-4 CLOCK LOSS SH CNT	H	F02D1	1
D5-4 INI	H	A03H1	1-01 *
D5-4 INI	H	B02A1	1-02 *
D5-4 INI	H	D04V1	1-03 *
D5-4 INI	H	E01V2	1-04 *
D5-4 INI	H	E01V2	1
D5-4 LD ERR	H	A02T2	1-01 *
D5-4 LD ERR	H	C03V1	1-02 *
D5-4 LD ERR	H	C03V1	1
D5-4 LD MISC	L	D03J1	1-01 *
D5-4 LD MISC	L	E02E1	1-02 *
D5-4 LD MISC	L	E02E1	1
D5-4 LD PTEE	H	A02D2	1-01 *
D5-4 LD PTEE	H	C03U2	1-02 *
D5-4 LD PTEE	H	C03U2	1
D5-4 LD SYNC	L	C03P1	1-01 *
D5-4 LD SYNC	L	D02R1	1-02 *
D5-4 LD SYNC	L	D02R1	1
D5-4 RX S (1)	H	D03J2	1-01 *
D5-4 RX S (1)	H	D04V2	1-02 *
D5-4 RX S (1)	H	F02H1	1-03 *
D5-4 RX S (1)	H	F02H1	1
D5-4 SEL 06 LD	L	C03A1	1-01 *
D5-4 SEL 06 LD	L	D04U1	1-02 *
D5-4 SEL 06 LD	L	D04U1	1
D5-4 TX S (1)	H	D03H2	1-01 *
D5-4 TX S (1)	H	F02F1	1-02 *
D5-4 TX S (1)	H	F02F1	1

[illegible]

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RUN NAME	A/P	PIN NAME	ORDER PIN	BAY ORDER	Q	DRAW RV PG Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN NUMBER		
D5-6 DLE EN (0)	H	E03D2		1-01 *		D14.6		1				240		
D5-6 DLE EN (0)	H	E04L1		1-02 *		D04						240		
D5-6 DLE EN (0)				1						3-2/8		240		
D5-6 LD TX SH REG	H	B02E2		1-01 *		D10		1				241		
D5-6 LD TX SH REG	H	D04K2		1-02 *		D04		2				241		
D5-6 LD TX SH REG	H	D03S1		1-03 *		D14.6						241		
D5-6 LD TX SH REG				1						12-0/8		241		
D5-6 SYNC EN	L	D03V1		1-01 *		D14.6		1				242		
D5-6 SYNC EN	L	D04H2		1-02 *		D04				4-0/8		242		
D5-6 SYNC EN				1								242		
D5-6 TX ACTIVE (1)	H	D04F2		1-01 *		D04		1				243		
D5-6 TX ACTIVE (1)	H	D02M1		1-02 *		D08		2				243		
D5-6 TX ACTIVE (1)	H	D02U1		1-03 *		D09		1				243		
D5-6 TX ACTIVE (1)	H	D03H1	C02A1	1-04 *		D14.6		2				243		
D5-6 TX ACTIVE (1)	H	C02A1		1-05 *								243		
D5-6 TX ACTIVE (1)				1						19-2/8		243		
D5-6 TX BIT CNTR 01 (1)	H	C02M2		1-01 *		D04		2				244		
D5-6 TX BIT CNTR 01 (1)	H	E04P1		1-02 *		D04		1				244		
D5-6 TX BIT CNTR 01 (1)	H	E03R2		1-03 *		D14.6				10-6/8		244		
D5-6 TX BIT CNTR 01 (1)				1								244		
D5-6 TX BIT CNTR 02 (1)	H	C02L2		1-01 *		D04		1				245		
D5-6 TX BIT CNTR 02 (1)	H	E03J1		1-02 *		D14.6		2				245		
D5-6 TX BIT CNTR 02 (1)	H	E04N1		1-03 *		D04				10-4/8		245		
D5-6 TX BIT CNTR 02 (1)				1								245		
D5-6 TX BIT CNTR 04 (1)	H	C02K1		1-01 *		D04		2				246		
D5-6 TX BIT CNTR 04 (1)	H	E03J2		1-02 *		D14.6		1				246		
D5-6 TX BIT CNTR 04 (1)	H	E04M1		1-03 *		D04				10-4/8		246		
D5-6 TX BIT CNTR 04 (1)				1								246		
D5-6 TX BIT CNTR 08 (1)	H	E03K1				D14.6			1-PIN RUN			247		
D5-6 TX FAKE END (1)	H	D04E2		1-01 *		D04		1				248		
D5-6 TX FAKE END (1)	H	E03B1		1-02 *		D14.6						248		
D5-6 TX FAKE END (1)				1						4-6/8		248		
D5-6 TX LATE	L	A02R2		1-01 *		D11		1				249		
D5-6 TX LATE	L	E03R1		1-02 *		D14.6				13-0/8		249		
D5-6 TX LATE				1								249		

DQ11AA.D			HND288.V23(23) 05/24/74			30-AUG-75			914			PAGE 25		
RUN NAME	A/P	PIN NAME	ORDER PIN	BAY ORDER	Q	DRAW RV PG Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN NUMBER		
D5-6 TX SYNC EN 15-8	L	C02L1		1-01 *		D04		1				250		
D5-6 TX SYNC EN 15-8	L	E03D1		1-02 *		D14.6						250		
D5-6 TX SYNC EN 15-8				1						7-0/8		250		
D5-6 TX SYNC EN 7-0	L	C02K2		1-01 *		D12		1				251		
D5-6 TX SYNC EN 7-0	L	E03E2		1-02 *		D14.6						251		
D5-6 TX SYNC EN 7-0				1						7-2/8		251		
D5-6 VRC/DATA EN	L	B02M1		1-01 *		D12		1				252		
D5-6 VRC/DATA EN	L	D03K1		1-02 *		D14.6				7-4/8		252		
D5-6 VRC/DATA EN				1								252		
D5-7 B RX C	L	D04M2		1-01 *		D04		1				253		
D5-7 B RX C	L	F03K1		1-02 *		D14.7				7-6/8		253		
D5-7 B RX C				1								253		
D5-7 CLR RX CNTL	L	F02L1		1-01 *		D10		1				254		
D5-7 CLR RX CNTL	L	F03U1		1-02 *		D14.7						254		
D5-7 CLR RX CNTL				1						3-4/8		254		
D5-7 LD RX BIT CNTR	L	E03L1				D14.7			1-PIN RUN			255		
D5-7 LD RX BUF 15-8	L	D03K2		1-01 *		D14.8		1				256		
D5-7 LD RX BUF 15-8	L	F02L2		1-02 *		D10						256		
D5-7 LD RX BUF 15-8				1						8-0/8		256		
D5-7 RX ACTIVE (1)	H	D03H1		1-01 *		D14.8		1				257		
D5-7 RX ACTIVE (1)	H	E02U2		1-02 *		D06		2				257		
D5-7 RX ACTIVE (1)	H	F04R2		1-03 *		D04				11-4/8		257		
D5-7 RX ACTIVE (1)				1								257		
D5-7 SYNC 01 (1)	H	D02C1		1-01 *		D06		1				258		
D5-7 SYNC 01 (1)	H	E03K2		1-02 *		D06				6-0/8		258		
D5-7 SYNC 01 (1)				1								258		
D5-7 SYNC 02 (1)	H	D02E1		1-01 *		D06		1				259		
D5-7 SYNC 02 (1)	H	E03T2		1-02 *		D14.7				6-4/8		259		
D5-7 SYNC 02 (1)				1								259		
D5-7 SYNC DATA EN	L	C03L1		1-01 *				1		2-6		260		
D5-7 SYNC DATA EN	L	D04P1		1-02 *						6-1/8		260		
D5-7 SYNC DATA EN				1								260		
D5-7 TEST JUMPER MATCH	L	F03J2		1-01 *		D14.7		1				261		
D5-7 TEST JUMPER MATCH	L	F04P2		1-02 *		D04						261		
D5-7 TEST JUMPER MATCH				1						3-2/8		261		

DQ11AA.D RUN NAME	HND288.V23(23) 05/24/74			30-AUG-75			914			PAGE 26		
	A/P	PIN	ORDER	BAY	Q	DRAW	RV	PG	Y	X	Z	REMARKS
PIN NAME												
ORDER												
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HND288.V23(23) 05/24/74													30-AUG-75	914	PAGE 28				
D011AA.D		A/P		PIN		NAME		ORDER		BAY - ORDER		Q	DRAW RV PG Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN NUMBER
D9-5 TX TOTAL TRANS	L	D03R1				1-01 *							D14.6		1				286
D9-5 TX TOTAL TRANS	L	D04R2				1-02 *							D04						286
D9-5 TX TOTAL TRANS																	3-0/8		286
D9-6 BCC ERR	L	A02V2				1-01 *							D11		1				287
D9-6 BCC ERR	L	D04U2				1-02 *							D04						287
D9-6 BCC ERR																	10-4/8		287
D9-6 DIS RX TRANSF PUL H		E03E1				1-01 *							D04		1				288
D9-6 DIS RX TRANSF PUL H		F04B2				1-02 *							D04						288
D9-6 DIS RX TRANSF PUL																	5-0/8		288
D9-6 RX BCC CYCLE	L	D02J2				1-01 *							D09		2				289
D9-6 RX BCC CYCLE	L	D04T2				1-02 *							D04		1				289
D9-6 RX BCC CYCLE	L	E03N1				1-03 *							D5.8						289
D9-6 RX BCC CYCLE																	8-4/8		289
D9-6 RX TOTAL TRANS	L	F03P1				1-01 *							D14.8		1				290
D9-6 RX TOTAL TRANS	L	F04S1				1-02 *							D04						290
D9-6 RX TOTAL TRANS																	3-0/8		290
DS R0Y	H	C01N2				1-01 *							D02		1				291
DS R0Y	H	D01E2				1-02 *							D02						291
DS R0Y																	4-2/8		291
GND 01		A01C2				1-01 *							D01		1				292
GND 01		A01N1				1-02 *							D01		2				292
GND 01		A01P1				1-03 *							D01		1				292
GND 01		A01R1				1-04 *							D01		2				292
GND 01		A01S1				1-05 *							D01		1				292
GND 01		A01T1				1-06 *							D01		2				292
GND 01		A01V2				1-07 *							D01		1				292
GND 01		B01C2				1-08 *							D01		2				292
GND 01		B01D1				1-09 *							D01		1				292
GND 01		B01E1				1-10 *							D01		2				292
GND 01		B01T1				1-11 *							D01		1				292
GND 01		B01V2				1-12 *							D01		2				292
GND 01		C01C2				1-13 *							D01		1				292
GND 01		C01T1				1-14 *							D01		2				292
GND 01		D01C2				1-15 *							D01		1				292
GND 01		D01T1				1-16 *							D01		2				292
GND 01		E01C2				1-17 *							D13		1				292
GND 01		E01T1				1-18 *							D13		2				292
GND 01		F01A1				1-19 *							D03		1				292
GND 01		F01C2				1-20 *							D01		2				292
GND 01		F01T1				1-21 *							D01						292
GND 01																	63-1/8		292

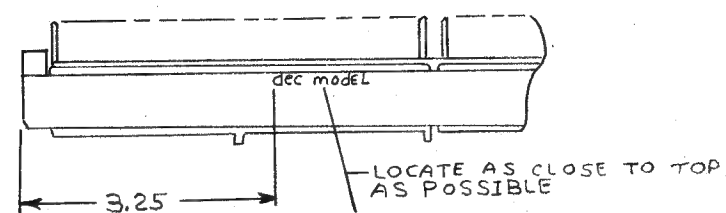
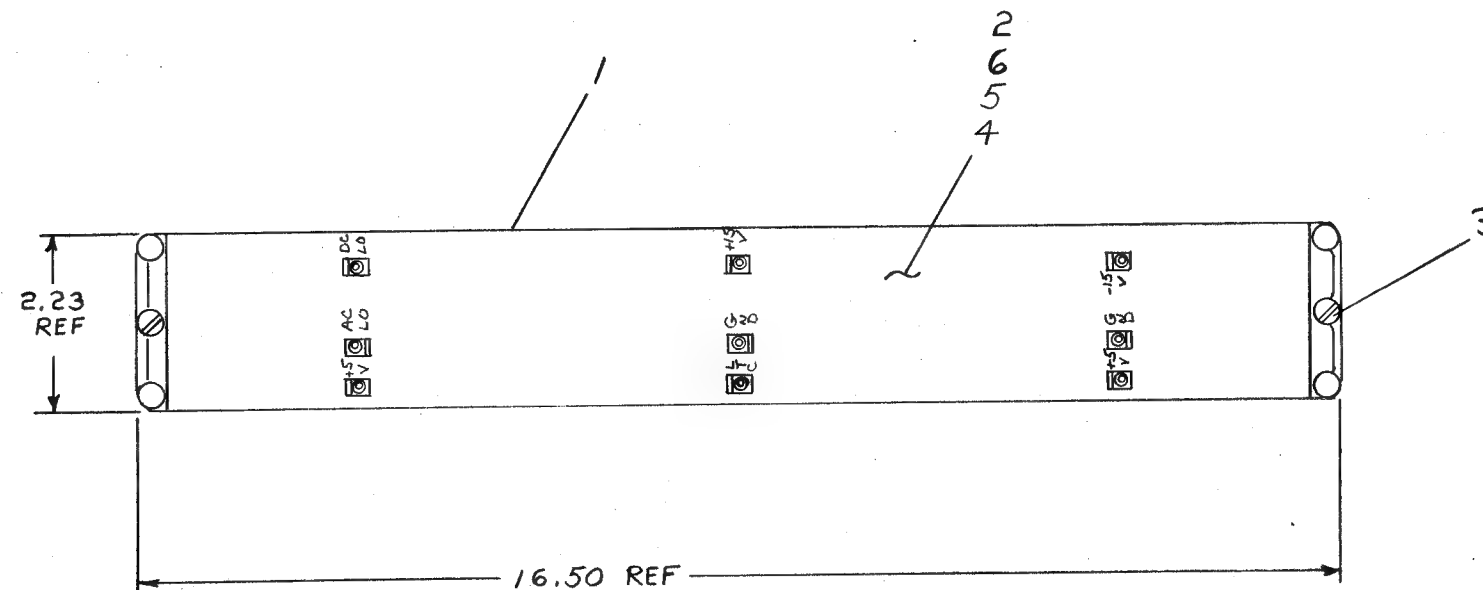
DQ11AA.D		HND288.V23(23) 05/24/74		30-AUG-75		914		PAGE 29					
RUN NAME	A/P	PIN	ORDER	PIN	BAY - ORDER	Q	DRAW RV PG Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN NUMBER
GND 02		A02C2			1-01 *		D01		1				293
GND 02		A02T1			1-02 *		D01		2				293
GND 02		B02C2			1-03 *		D01		1				293
GND 02		B02T1			1-04 *		D01		2				293
GND 02		C02C2			1-05 *		D01		1				293
GND 02		C02T1			1-06 *		D01		2				293
GND 02		D02C2			1-07 *		D01		1				293
GND 02		D02T1			1-08 *		D01		2				293
GND 02		E02C2			1-09 *		D01		1				293
GND 02		E02T1			1-10 *		D01		2				293
GND 02		F02C2			1-11 *		D01		1				293
GND 02		F02T1			1-12 *		D01		1				293
GND 02					1						41-0/8		293
GND 03		A03C2			1-01 *		D01		1				294
GND 03		A03T1			1-02 *		D01		2				294
GND 03		B03C2			1-03 *		D01		1				294
GND 03		B03T1			1-04 *		D01		2				294
GND 03		C03C2			1-05 *		D01		1				294
GND 03		C03T1			1-06 *		D01		2				294
GND 03		D03C2			1-07 *		D01		1				294
GND 03		D03T1			1-08 *		D01		2				294
GND 03		E03C2			1-09 *		D01		1				294
GND 03		E03T1			1-10 *		D01		2				294
GND 03		F03C2			1-11 *		D01		1				294
GND 03		F03T1			1-12 *		D01		1				294
GND 03					1						41-0/8		294

D011AA.D RUN NAME	A/P	PIN ORDER NAME PIN	BAY - ORDER	HND288.V23(23) 05/24/74	Q	DRAW RV PG Y	X	Z	REMARKS	30-AUG-75 LENGTH	914 EXCEPTIONS	PAGE 30 RUN NUMBER
GND 04		A04C2	1-01 *			D01		1				295
GND 04		A04N1	1-02 *			D01		2				295
GND 04		A04P1	1-03 *			D01		1				295
GND 04		A04R1	1-04 *			D01		2				295
GND 04		A04S1	1-05 *			D01		1				295
GND 04		A04T1	1-06 *			D01		2				295
GND 04		A04V2	1-07 *			D01		1				295
GND 04		B04C2	1-08 *			D01		2				295
GND 04		B04D1	1-09 *			D01		2				295
GND 04		B04E1	1-10 *			D01		2				295
GND 04		B04F1	1-11 *			D01		1				295
GND 04		B04V2	1-12 *			D01		2				295
GND 04		C04C2	1-13 *			D01		1				295
GND 04		C04J2	1-14 *			D03		2				295
GND 04		C04R1	1-15 *			D03		1				295
GND 04		C04T1	1-16 *			D01		2				295
GND 04		D04C2	1-17 *			D04		1				295
GND 04		D04T1	1-18 *			D04		2				295
GND 04		E04C2	1-19 *			D04		1				295
GND 04		E04T1	1-20 *			D04		2				295
GND 04		F04C2	1-21 *			D04		2				295
GND 04		F04T1	1-22 *			D04		1				295
GND 04			1							65=0/8		295
MASTER B	L	C04P2	1-01 *			D03		2				296
MASTER B	L	C04R2	1-02 *			D03		1				296
MASTER B	L	C04S2	1-03 *			D03						296
MASTER B			1							5=0/8		296
RECEIVE DATA	L	C01F2	1-01 *			D02		1				297
RECEIVE DATA	L	D01J2	1-02 *			D02						297
RECEIVE DATA			1							5=2/8		297
RING	H	C01M2	1-01 *			D02		1				298
RING	H	D01K2	1-02 *			D02						298
RING			1							4=6/8		298
SCR	H	C01J2	1-01 *			D02		1				299
SCR	H	D01F1	1-02 *			D02						299
SCR			1							5=0/8		299
SCT	H	C01H2	1-01 *			D02		1				300
SCT	H	D01J1	1-02 *			D02						300
SCT			1							2=4		300
SCT										5=5/8		300





9	WIRE SHIELDS	9009526	11
1	LOCKING TERMINAL, SHAKE PROOF	90-06766	12
4	#24 AWG SOLID KYNAR INS. WIRE, BLK	9107688-00	10
4	LOGIC WASHER EXT TOOTH #6	9007649	9
4	STAND-OFF JAN 4146 B	9009120-1	8
6	WIRE WRAP PINS	1210385	7
6	SC PH PAN HD #8-32X5/8 SELF TAP	9006120	6
3	288 PIN CONN BLOCK TYPE #H809	1210258	5
1	CASTING, THREE BLOCK	ESC-1209583-a-1	4
9	EYELETS	9009000	3
9	FASTON TABS	9008219	2
1	ETCHED CIRCUIT BOARD	5010093	1
QTY.	DESCRIPTION	PART NO.	ITEM

REVISIONS		
CHK	CHANGE NO.	REV.
28	7009152-00001	A
<i>Change No. 72 23 October 5:13</i> V. BASTIANI		
<i>1/1 Boston 2-12-73</i>		
28	7009152-00002	B
<i>1/1 Boston 9-21-73</i> BASTIANI		
<i>1/1 Boston 10-9-73</i>		

ITEM NO	SIGNAL NAME	FROM PIN	TO PIN	COLOR	AWG
6	BUS AC LO	BØ1 F1	WIRE WRAP PIN AT AC LO LUG	YEL	# 3Ø
6	BUS DC LO	BØ1 F2	WIRE WRAP PIN AT DC LO LUG	YEL	# 3Ø



A/R	#30 SOLID CONDUCTOR KYNAR	9105740-Ø4	6
A/R	#24 SOLID CONDUCTOR KYNAR	9107688-Ø6	5
A/R	#24 SOLID CONDUCTOR KYNAR	9107688-Ø3	4
2	SCR CAPTIVE	9008167	3
1	WIRE LIST (DQ11-AB)	K-WL-DQ11-Ø-14	2
1	BACK PANEL	D-IA-700915200	1


FIRST USED ON OPTION/MODEL		QTY.	DESCRIPTION		PART NO.		ITEM NO.				
DQ11		PARTS LIST									
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES		DRN.	E. Wilson		DATE	<div><div>digital</div><div>EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS</div></div>					
		CHK'D.	W. J. Co.		DATE				4/10/73		
TOLERANCES		ENG.	R. Fane		DATE				TITLE WIRED ASS'Y (DQ11-AB)		
DECIMALS	ANGLES	PROJ. ENG.	R. Fane		DATE						
.xxx = .005	±0° 30'				12-10-73						
.xx = .02		PROD.	R. Wall		DATE						
.x = .1					12-11-73						
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY ✓											
MATERIAL		NEXT HIGHER ASSY.									
		A-PL-DQ11-Ø-Ø					SIZE	CODE	NUMBER	REV.	
FINISH		SCALE 					C	IA	7009468-0-0		
							SHEET  OF 				

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DIGITAL EQUIPMENT CORPORATION

REV E
NUMBER DQ11-0-14
SIZE CODE KWL
2

REVISIONS		
CHK	CHANGE NO.	REV.
28	DQ11AB-00001	A
R. Lisee 4-10-74		
R. Lisee 4-25-74		
28	DQ11AB-00002	B
J. Charlin 4-29-74		
LISEE		
R. Lisee 5-6-74		
28	DQ11AB-00003	C
R. Lisee 8-30-74		
R. Lisee		
R. Lisee 9-9-74		
28	DQ11AB-00004	D
R. Lisee 3-25-75		
R. Lisee		
R. Lisee 3-27-75		
28	DQ11AB-00005	E
R. Lisee 7-24-75		
R. Lisee		
R. Lisee 8-5-75		

FIRST USED ON OPTION MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
DQ11				
PARTS LIST				
DRN E. Wilson	DATE 8/31/73	<div> DIGITAL EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS</div> <div>TITLE <h1>WIRE LIST</h1><h2>(DQ11-AB)</h2></div>		
CHK'D [Signature]	DATE 10/22/73			
ENG. R. Lisee	DATE 12-10-73			
PROJ. ENG. R. Lisee	DATE 12-10-73			
PROD. R. Wall	DATE 12-11-73			
NEXT HIGHER ASSEMBLY C-1A-7009468-0-0		SIZE CODE K WL	NUMBER DQ11-0-14	REV. E
SCALE NONE		DIST.		
SHEET 1 OF 1				

HND288.V23(23) 05/24/74														PAGE 3																	
A/P		PIN		ORDER		BAY -		Q		DRAW		RV		PG		Y		X		Z		REMARKS		23-AUG-75		11:26		EXCEPTIONS		RUN	
		NAME		PIN		ORDER																								NUMBER	
BUS AC LO	L	B01P1	1-01 *												D01						1								25		
BUS AC LO	L	B04P1	1-02 *												D04														25		
BUS AC LO																									3-6/8				25		
BUS PRSY	L	A01P2	1-01 *												D01						1								26		
BUS PRSY	L	A04P2	1-02 *												D01														26		
BUS PRSY																									3-6/8				26		
BUS RH4	L	B01D2	1-01 *												D01						1								27		
BUS RH4	L	B04D2	1-02 *												D01														27		
BUS RH4																									3-6/8				27		
BUS RH5	L	B01C1	1-01 *												D01						1								28		
BUS RH5	L	B04C1	1-02 *												D01														28		
BUS RH5																									3-6/8				28		
BUS RH6	L	A01U2	1-01 *												D01						1								29		
BUS RH6	L	A04U2	1-02 *												D01														29		
BUS RH6																									3-6/8				29		
BUS RH7	L	A01T2	1-01 *												D01						1								30		
BUS RH7	L	A04T2	1-02 *												D01														30		
BUS RH7																									3-6/8				30		
BUS C0	L	B01U2	1-01 *												D01						1								31		
BUS C0	L	B04U2	1-02 *												D01														31		
BUS C0																									3-6/8				31		
BUS C1	L	B01T2	1-01 *												D01						1								32		
BUS C1	L	B04T2	1-02 *												D01														32		
BUS C1																									3-6/8				32		
BUS D00	L	A03S2	1-01 *												D8-1						1								33		
BUS D00	L	A02K2	1-02 *												D9-1						2								33		
BUS D00	L	A01C1	1-03 *												D01						1								33		
BUS D00	L	A04C1	1-04 *												D01														33		
BUS D00																									10-4/8				33		
BUS D01	L	A03P1	1-01 *												D8-1						1								34		
BUS D01	L	A02J2	1-02 *												D9-1						2								34		
BUS D01	L	A01D2	1-03 *												D01						1								34		
BUS D01	L	A04D2	1-04 *												D01														34		
BUS D01																									10-0/8				34		

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Q0118A.E		RUN NAME		A/P		PIN		ORDER		BAY -		Q		DRAW		RV		PG		Y		X		Z		REMARKS		LENGTH		EXCEPTIONS		RUN		NUMBER																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																													
BUS D02	L	A01D1	1-01 *																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																												</

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A/P PIN ORDER BAY -										LENGTH	EXCEPTIONS	RUN	NUMBER
NAME													
Q DRAW RV PG Y X Z REMARKS													
BUS D10	L	A01J1	1-01 *							D01		1	43
BUS D10	L	A02D2	1-02 *							D9-1		2	43
BUS D10	L	A04J1	1-03 *							D01		1	43
BUS D10	L	B03A1	1-04 *							D8-1		1	43
			1							11-0/8			43
BUS D11	L	A01K2	1-01 *							D01		2	44
BUS D11	L	A02D1	1-02 *							D9-1		1	44
BUS D11	L	A03E1	1-03 *							D8-1		2	44
BUS D11	L	A04K2	1-04 *							D01		1	44
			1							9-2/8			44
BUS D12	L	A01K1	1-01 *							D01		2	45
BUS D12	L	A02F2	1-02 *							D9-1		1	45
BUS D12	L	A03K2	1-03 *							D8-1		2	45
BUS D12	L	A04K1	1-04 *							D01		1	45
			1							9-0/8			45
BUS D13	L	A01L2	1-01 *							D01		2	46
BUS D13	L	A02F1	1-02 *							D9-1		1	46
BUS D13	L	A03H1	1-03 *							D8-1		2	46
BUS D13	L	A04L2	1-04 *							D01		1	46
			1							9-2/8			46
BUS D14	L	A01L1	1-01 *							D01		1	47
BUS D14	L	A02E2	1-02 *							D9-1		2	47
BUS D14	L	A03J2	1-03 *							D8-1		1	47
BUS D14	L	A04L1	1-04 *							D01		1	47
			1							9-2/8			47
BUS D15	L	A01M2	1-01 *							D01		2	48
BUS D15	L	A02E1	1-02 *							D9-1		1	48
BUS D15	L	A03F2	1-03 *							D8-1		2	48
BUS D15	L	A04M2	1-04 *							D01		1	48
			1							9-6/8			48
BUS DC LO	L	R01F2	1-01 *							D01		1	49
BUS DC LO	L	R04F2	1-02 *							D01			49
			1							3-6/8			49
BUS INIT	L	A01A1	1-01 *							D01		1	50
BUS INIT	L	A04A1	1-02 *							D01			50
			1							3-6/8			50
BUS INTR	L	A01B1	1-01 *							D01		1	51
BUS INTR	L	A04B1	1-02 *							D01			51
			1							3-6/8			51

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A/P PIN ORDER BAY -										LENGTH	EXCEPTIONS	RUN	NUMBER
NAME													
Q DRAW RV PG Y X Z REMARKS													
BUS MSYN	L	B01V1	1-01 *							D01		2	52
BUS MSYN	L	B04V1	1-02 *							D01		1	52
BUS MSYN	L	E04T2	1-03 *							D3-2			52
			1							13-6/8			52
BUS NPG	H	A01U1	1-01 *							D01		1	53
BUS NPG	H	A04U1	1-02 *							D01			53
			1							3-6/8			53
BUS APR	L	A01S2	1-01 *							D01		1	54
BUS APR	L	A04S2	1-02 *							D01			54
			1							3-6/8			54
BUS PA	L	A01M1	1-01 *							D01		1	55
BUS PA	L	A04M1	1-02 *							D01			55
			1							3-6/8			55
BUS PH	L	A01N2	1-01 *							D01		1	56
BUS PH	L	A04N2	1-02 *							D01			56
			1							3-6/8			56
BUS SACK	L	A01R2	1-01 *							D01		1	57
BUS SACK	L	A04R2	1-02 *							D01			57
			1							3-6/8			57
BUS SSYN	L	B01U1	1-01 *							D01		1	58
BUS SSYN	L	B04U1	1-02 *							D01			58
			1							3-6/8			58
D3-1 KA CRYSTAL CLOCK	H	C01D2	1-01 *							D02		1	59
D3-1 KA CRYSTAL CLOCK	H	D01D2	1-02 *							D02			59
			1							5-0/8			59
D3-1 MASTER A	L	E01N2	1-01 *							D02		1	60
D3-1 MASTER A	L	E04N2	1-02 *							D02			60
			1							3-6/8			60
D4-3 AB MUX SEL	H	C02V2	1-01 *							D9-2		1	61
D4-3 AB MUX SEL	H	D01B1	1-02 *							D02			61
			1							3-4/8			61
D4-3 BCC 23-16 (1)	H	B02H2	1-01 *							D9-2		1	62
D4-3 BCC 23-16 (1)	H	D01A1	1-02 *							D02			62
			1							7-2/8			62

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	A/P	PIN NAME	ORDER PIN	Q	DRAW RV PG Y	X	Z	REMARKS	LENGTH	EXCEPTIONS
D4-3 RX CLOCK	H	D01D1	1-01 *		D02		2			
D4-3 RX CLOCK	H	E02F1	1-02 *		D9-6		1			63
D4-3 RX CLOCK	H	F03J1	1-03 *		D8-6				10-6/8	63
D4-3 RX CLOCK			1							63
D4-3 TX CLOCK	H	D01C1	1-01 *		D02		1			64
D4-3 TX CLOCK	H	E02E2	1-02 *		D9-5				5-4/8	64
D4-3 TX CLOCK			1							64
D4-4 LD RX 15-8	H	C03H1	1-01 *		D8-3		1			65
D4-4 LD RX 15-8	H	F01B1	1-02 *		D02				10-0/8	65
D4-4 LD RX 15-8			1							65
D4-4 STRIP SYNC (1)	H	D02N1	1-01 *		D9-6		1			66
D4-4 STRIP SYNC (1)	H	F01A1	1-02 *		D02		2			66
D4-4 STRIP SYNC (1)	H	F03F1	1-03 *		D8-6				10-2/8	66
D4-4 STRIP SYNC (1)			1							66
D4-5 RD 00	H	B03E1	1-01 *		D8-2		1			67
D4-5 RD 00	H	F01J2	1-02 *		D02		2			67
D4-5 RD 00	H	E04J2	1-03 *		D3-1				14-4/8	67
D4-5 RD 00			1							67
D4-5 RD 01	H	B03K1	1-01 *		D8-2		1			68
D4-5 RD 01	H	E04M2	1-02 *		D3-1		2			68
D4-5 RD 01	H	E01M2	1-03 *		D02				14-4/8	68
D4-5 RD 01			1							68
D4-5 RD 02	H	B03H1	1-01 *		D8-2		1			69
D4-5 RD 02	H	E01L2	1-02 *		D02		2			69
D4-5 RD 02	H	E04L2	1-03 *						14-4/8	69
D4-5 RD 02			1							69
D4-5 RD 03	H	B03C1	1-01 *		D8-2		1			70
D4-5 RD 03	H	E04K2	1-02 *		D3-1		2			70
D4-5 RD 03	H	E01K2	1-03 *		D02				15-0/8	70
D4-5 RD 03			1							70
D4-5 RD 04	H	B03F2	1-01 *		D8-2		1			71
D4-5 RD 04	H	E04F2	1-02 *		D3-1		2			71
D4-5 RD 04	H	E01F2	1-03 *		D02				14-0/8	71
D4-5 RD 04			1							71
D4-5 RD 05	H	B03L2	1-01 *		D8-2		1			72
D4-5 RD 05	H	E04H2	1-02 *		D3-1		2			72
D4-5 RD 05	H	E01H2	1-03 *		D02				13-6/8	72
D4-5 RD 05			1							72

Q011AB.E RUN NAME	HND288.V23(23) 05/24/74			23-AUG-75			11126		PAGE 8	
	A/P	PIN NAME	ORDER PIN	Q	DRAW RV PG Y	X	Z	REMARKS	LENGTH	EXCEPTIONS
D4-5 RD 06	H	B03D2	1-01 *		D8-2		1			73
D4-5 RD 06	H	E04D2	1-02 *		D3-1		2			73
D4-5 RD 06	H	E01D2	1-03 *		D02				14-0/8	73
D4-5 RD 06			1							73
D4-5 RD 07	H	B03E2	1-01 *		D8-2		1			74
D4-5 RD 07	H	E04F2	1-02 *		D3-1		2			74
D4-5 RD 07	H	E01E2	1-03 *		D02				14-0/8	74
D4-5 RD 07			1							74
D4-5 RD 08	H	C03M1	1-01 *		D8-2		1			75
D4-5 RD 08	H	F01J2	1-02 *		D02		2			75
D4-5 RD 08	H	F04J2	1-03 *		D3-1				14-0/8	75
D4-5 RD 08			1							75
D4-5 RD 09	H	D03J1	1-01 *		D8-2		1			76
D4-5 RD 09	H	F04M2	1-02 *		D3-1		2			76
D4-5 RD 09	H	F01M2	1-03 *		D02				12-0/8	76
D4-5 RD 09			1							76
D4-5 RD 10	H	C03L1	1-01 *		D8-2		1			77
D4-5 RD 10	H	F04L2	1-02 *		D3-1		2			77
D4-5 RD 10	H	F01L2	1-03 *		D02				14-4/8	77
D4-5 RD 10			1							77
D4-5 RD 11	H	C03F1	1-01 *		D8-2		1			78
D4-5 RD 11	H	F04K2	1-02 *		D3-1		2			78
D4-5 RD 11	H	F01K2	1-03 *		D02				14-6/8	78
D4-5 RD 11			1							78
D4-5 RD 12	H	C03S1	1-01 *		D8-2		1			79
D4-5 RD 12	H	F01F2	1-02 *		D02		2			79
D4-5 RD 12	H	F04F2	1-03 *		D3-1				13-2/8	79
D4-5 RD 12			1							79
D4-5 RD 13	H	C03J1	1-01 *		D8-2		1			80
D4-5 RD 13	H	F04H2	1-02 *		D3-1		2			80
D4-5 RD 13	H	F01H2	1-03 *		D02				14-2/8	80
D4-5 RD 13			1							80
D4-5 RD 14	H	C03K1	1-01 *		D8-2		1			81
D4-5 RD 14	H	F01D2	1-02 *		D02		2			81
D4-5 RD 14	H	F04D2	1-03 *		D3-1				13-6/8	81
D4-5 RD 14			1							81

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A/P PIN ORDER BAY -										LENGTH	EXCEPTIONS	RUN	NUMBER
NAME PIN ORDER													
Q DRAW RV PG Y X Z REMARKS													
D4-5 RD 15	H	C03T2	1-01 *							D8-2		1	82
D4-5 RD 15	H	F04E2	1-02 *							D3-1		2	82
D4-5 RD 15	H	F01E2	1-03 *							D02			82
D4-5 RD 15			1								13-0/8		82
D4-5 RX BCC DATA IN	H	C02P2	1-01 *							D9-3		1	83
D4-5 RX BCC DATA IN	H	D01E1	1-02 *							D02			83
D4-5 RX BCC DATA IN			1								4-4/8		83
D4-5 TD 00	H	B03F1	1-01 *							D8-2		1	84
D4-5 TD 00	H	E01A1	1-02 *							D02			84
D4-5 TD 00			1								10-0/8		84
D4-5 TD 01	H	B03R1	1-01 *							D8-2		1	85
D4-5 TD 01	H	F01C1	1-02 *							D02			85
D4-5 TD 01			1								9-2/8		85
D4-5 TD 02	H	B03J1	1-01 *							D8-2		1	86
D4-5 TD 02	H	E01D1	1-02 *							D02			86
D4-5 TD 02			1								10-0/8		86
D4-5 TD 03	H	B03D1	1-01 *							D8-2		1	87
D4-5 TD 03	H	E01E1	1-02 *							D02			87
D4-5 TD 03			1								10-6/8		87
D4-5 TD 04	H	B03J2	1-01 *							D8-2		1	88
D4-5 TD 04	H	E01F1	1-02 *							D02			88
D4-5 TD 04			1								10-4/8		88
D4-5 TD 05	H	B03M2	1-01 *							D8-2		1	89
D4-5 TD 05	H	E01H1	1-02 *							D02			89
D4-5 TD 05			1								10-2/8		89
D4-5 TD 06	H	B03K2	1-01 *							D8-2		1	90
D4-5 TD 06	H	E01J1	1-02 *							D02			90
D4-5 TD 06			1								10-4/8		90
D4-5 TD 07	H	B03H2	1-01 *							D8-2		1	91
D4-5 TD 07	H	E01K1	1-02 *							D02			91
D4-5 TD 07			1								11-0/8		91
D4-5 TD 08	H	C03P2	1-01 *							D8-2		1	92
D4-5 TD 08	H	F01C1	1-02 *							D02			92
D4-5 TD 08			1								9-4/8		92

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A/P PIN ORDER BAY -										LENGTH	EXCEPTIONS	RUN	NUMBER
NAME PIN ORDER													
Q DRAW RV PG Y X Z REMARKS													
D4-5 TD 09	H	D03K1	1-01 *							D8-2		1	93
D4-5 TD 09	H	F01D1	1-02 *							D02			93
D4-5 TD 09			1								7-2/8		93
D4-5 TD 10	H	D03H1	1-01 *							D8-2		1	94
D4-5 TD 10	H	F01E1	1-02 *							D02			94
D4-5 TD 10			1								7-6/8		94
D4-5 TD 11	H	C03P1	1-01 *							D8-2		1	95
D4-5 TD 11	H	F01F1	1-02 *							D02			95
D4-5 TD 11			1								9-6/8		95
D4-5 TD 12	H	C03U2	1-01 *							D8-2		1	96
D4-5 TD 12	H	F01H1	1-02 *							D02			96
D4-5 TD 12			1								9-6/8		96
D4-5 TD 13	H	C03V2	1-01 *							D8-2		1	97
D4-5 TD 13	H	F01J1	1-02 *							D02			97
D4-5 TD 13			1								9-6/8		97
D4-5 TD 14	H	C03V1	1-01 *							D8-2		1	98
D4-5 TD 14	H	F01K1	1-02 *							D02			98
D4-5 TD 14			1								9-6/8		98
D4-5 TD 15	H	C03U1	1-01 *							D8-2		1	99
D4-5 TD 15	H	F01L1	1-02 *							D02			99
D4-5 TD 15			1								9-6/8		99
D4-7 RX SYNC DET	H	D02M1	1-01 *							D9-6		1	100
D4-7 RX SYNC DET	H	F03E1	1-02 *							D8-6		2	100
D4-7 RX SYNC DET	H	F01N2	1-03 *							D02		1	100
D4-7 RX SYNC DET	H	F04N2	1-04 *							D3-1			100
D4-7 RX SYNC DET			1								14-2/8		100
D4-7 TX DATA	H	D01F1	1-01 *							D02		1	101
D4-7 TX DATA	H	E02E1	1-02 *							D09-4			101
D4-7 TX DATA			1								5-0/8		101
D5-1 CC-BA ADPS 08	L	B02H1	1-01 *							D9-2		1	102
D5-1 CC-BA ADPS 08	L	D01H1	1-02 *							D02			102
D5-1 CC-BA ADPS 08			1								7-6/8		102
D5-1 CC-BA ADPS 09	L	B02J1	1-01 *							D9-2		1	103
D5-1 CC-BA ADPS 09	L	D01J1	1-02 *							D02			103
D5-1 CC-BA ADPS 09			1								7-6/8		103

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A/P PIN ORDER BAY -										LENGTH	EXCEPTIONS	RUN	
Q DRAW RV PG Y X Z REMARKS												NUMBER	
D0118.E													
D5-1 CC-BA ADPS 10	L	D01K1	1-01 *							D02			104
D5-1 CC-BA ADPS 10	L	E02L1	1-02 *							D9-2			104
D5-1 CC-BA ADPS 10			1								5-2/8		104
D5-2 DI PORT 14	L	D01L1	1-01 *							D02			105
D5-2 DI PORT 14	L	F02E2	1-02 *							D9-6			105
D5-2 DI PORT 14			1								7-2/8		105
D5-2 SP PORT 13	H	D01M1	1-01 *							D02			106
D5-2 SP PORT 13	H	F02J2	1-02 *							D9-5			106
D5-2 SP PORT 13			1								7-4/8		106
D5-2 SP PORT 14	H	D01N1	1-01 *							D02			107
D5-2 SP PORT 14	H	F02N1	1-02 *							D9-5			107
D5-2 SP PORT 14			1								7-6/8		107
D5-3 CNTR LD PULSE	H	D01R1	1-01 *							D02			108
D5-3 CNTR LD PULSE	H	E02V2	1-02 *							D9-2			108
D5-3 CNTR LD PULSE			1								5-6/8		108
D5-3 LD SP PORT	L	D01S1	1-01 *							D02			109
D5-3 LD SP PORT	L	D02R1	1-02 *							D9-6			109
D5-3 LD SP PORT			1								3-0/8		109
D5-3 RX CYCLE	H	E04B1	1-01 *							D3-2			110
D5-3 RX CYCLE	H	E01B1	1-02 *							D02			110
D5-3 RX CYCLE	H	F02B1	1-03 *							D9-5			110
D5-3 RX CYCLE	H	F03R2	1-04 *							D8-6			110
D5-3 RX CYCLE			1								13-2/8		110
D5-3 TST NEXT CC (1)	H	C02U2	1-01 *							D9-5			111
D5-3 TST NEXT CC (1)	H	D01L2	1-02 *							D03			111
D5-3 TST NEXT CC (1)			1								4-4/8		111
D5-4 B SSYN	H	E01U2	1-01 *							D02			112
D5-4 B SSYN	H	E04U2	1-02 *							D02			112
D5-4 B SSYN			1								3-6/8		112
D5-4 INI	H	D01V1	1-01 *							D02			113
D5-4 INI	H	D02L2	1-02 *							D9-2			113
D5-4 INI			1								3-6/8		113
D5-4 RX S (1)	H	D01V2	1-01 *							D5-4			114
D5-4 RX S (1)	H	E02D2	1-02 *							D9-6			114
D5-4 RX S (1)			1								3-2/8		114

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A/P PIN ORDER BAY -										LENGTH	EXCEPTIONS	RUN	
Q DRAW RV PG Y X Z REMARKS												NUMBER	
D0118.E													
D5-4 SEL 6 LD	L	D01U1	1-01 *							D02			115
D5-4 SEL 6 LD	L	D02P1	1-02 *							D9-6			115
D5-4 SEL 6 LD			1								3-0/8		115
D5-6 1 TO TX SEARCH RQ	H	E01R1	1-01 *							D8-3			116
D5-6 1 TO TX SEARCH RQ	H	F03N1	1-02 *							D8-3			116
D5-6 1 TO TX SEARCH RQ			1								5-2/8		116
D5-6 B TX C	L	D01B2	1-01 *							D02			117
D5-6 B TX C	L	F02S2	1-02 *							D9-5			117
D5-6 B TX C			1								9-4/8		117
D5-6 RCC EN (0)	H	D01J2	1-01 *							D02			118
D5-6 RCC EN (0)	H	E02D1	1-02 *							D9-5			118
D5-6 RCC EN (0)	H	F03V2	1-03 *										118
D5-6 RCC EN (0)			1								11-6/8		118
D5-6 DLE EN (0)	H	E01L1	1-01 *							D02			119
D5-6 DLE EN (0)	H	F03V1	1-02 *							D02			119
D5-6 DLE EN (0)			1								6-4/8		119
D5-6 LD TX SH REG	H	B03V2	1-01 *							D8-5			120
D5-6 LD TX SH REG	H	C03P1	1-02 *							D8-2			120
D5-6 LD TX SH REG	H	D01K2	1-03 *							D02			120
D5-6 LD TX SH REG	H	E02M1	1-04 *							D9-5			120
D5-6 LD TX SH REG			1								14-6/8		120
D5-6 SYNC EN	L	D01H2	1-01 *							D02			121
D5-6 SYNC EN	L	E02U1	1-02 *							D9-5			121
D5-6 SYNC EN			1								6-2/8		121
D5-6 SYNC/DATA EN	L	D01P1	1-01 *							D02			122
D5-6 SYNC/DATA EN	L	E03U1	1-02 *							D8-5			122
D5-6 SYNC/DATA EN			1								5-6/8		122
D5-6 TX ACTIVE (1)	H	D01F2	1-01 *							D02			123
D5-6 TX ACTIVE (1)	H	F03B1	1-02 *							D8-3			123
D5-6 TX ACTIVE (1)	H	F02D2	1-03 *							D9-5			123
D5-6 TX ACTIVE (1)			1								10-2/8		123
D5-6 TX BIT CNTR 1 (1)	H	C03E1	1-01 *							D8-5			124
D5-6 TX BIT CNTR 1 (1)	H	E01P1	1-02 *							D02			124
D5-6 TX BIT CNTR 1 (1)			1								9-0/8		124
D5-6 TX BIT CNTR 2 (1)	H	C03D1	1-01 *							D8-5			125
D5-6 TX BIT CNTR 2 (1)	H	E01N1	1-02 *							D02			125
D5-6 TX BIT CNTR 2 (1)			1								9-0/8		125

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RUN NAME												NUMBER
D5-6 TX BIT CNTR 4 (1)	H	C03C1		1-01 *		D8-5		1				126
D5-6 TX BIT CNTR 4 (1)	H	F01M1		1-02 *		D02						126
D5-6 TX BIT CNTR 4 (1)				1						9-0/8		126
D5-6 TX FAKE END (1)	H	D01E2		1-01 *		D02		1				127
D5-6 TX FAKE END (1)	H	F02H1		1-02 *		D9-5				8-0/8		127
D5-6 TX FAKE END (1)				1								127
D5-7 B RX C	L	D01M2		1-01 *		D02		1				128
D5-7 R RX C	L	E02H1		1-02 *		D9-6				4-4/8		128
D5-7 B RX C				1								128
D5-7 RX ACTIVE (1)	H	D02D2		1-01 *	1			1				129
D5-7 RX ACTIVE (1)	H	F03J1		1-02 *		D8-6		2				129
D5-7 RX ACTIVE (1)	H	F03C1		1-03 *		D8-3		1				129
D5-7 RX ACTIVE (1)	H	F04R2		1-04 *		D3-1		2				129
D5-7 RX ACTIVE (1)	H	F01R2		1-05 *		D02						129
D5-7 RX ACTIVE (1)				1						17-6/8		129
D5-7 TEST JUMPER MATCH L	L	F02J1		1-01 *		D9-6		2				130
D5-7 TEST JUMPER MATCH L	L	F01P2		1-02 *		D02		1				130
D5-7 TEST JUMPER MATCH L	L	F03P1		1-03 *		D8-3		2				130
D5-7 TEST JUMPER MATCH L	L	F04P2		1-04 *		D3-1						130
D5-7 TEST JUMPER MATCH				1						9-2/8		130
D5-8 RX CC ODD	L	D01N2		1-01 *		D02		1				131
D5-8 RX CC ODD	L	E02K1		1-02 *		D9-6				4-4/8		131
D5-8 RX CC ODD				1								131
D6-1 Q1 TO CHAR INTR	L	F01V2		1-01 *		D02		2				132
D6-1 Q1 TO CHAR INTR	L	E03R1		1-02 *		D8-4		1				132
D6-1 Q1 TO CHAR INTR	L	E04V2		1-03 *		D3-1						132
D6-1 Q1 TO CHAR INTR				1						6-4/8		132
D6-1 CD 08	H	C03A1		1-01 *		D8-3		1				133
D6-1 CD 08	H	F01V2		1-02 *		D02		2				133
D6-1 CD 08	H	F04V2		1-03 *		D3-1				16-4/8		133
D6-1 CD 08				1								133
D6-1 CD 09	H	C03B1		1-01 *		D8-3		1				134
D6-1 CD 09	H	F04T2		1-02 *		D3-1		2				134
D6-1 CD 09	H	F01T2		1-03 *		D02						134
D6-1 CD 09				1						16-2/8		134

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D6-1	CD 10	H		C03N2	1-01 *					D8-3		1	1						135
D6-1	CD 10	H		F04S2	1-02 *					D3-1		2	2						135
D6-1	CD 10	H		F01S2	1-03 *					D02						14-6/8			135
D6-1	CD 10				1														135
D6-1	CD 11	H		C03N1	1-01 *					D8-3		1	1						136
D6-1	CD 11	H		F04U2	1-02 *					D3-1		2	2						136
D6-1	CD 11	H		F01U2	1-03 *					D02						15-0/8			136
D6-1	CD 11				1														136
D6-2	END NPR CYCLE (0)	H		E01R2	1-01 *					D02		1	1						137
D6-2	END NPR CYCLE (0)	H		F03U2	1-02 *					D8-6		2	2						137
D6-2	END NPR CYCLE (0)	H		E04R2	1-03 *					D3-2						6-6/8			137
D6-2	END NPR CYCLE (0)				1														137
D6-2	LD TX BUF (0)	H		E01P2	1-01 *					D02		1	1						138
D6-2	LD TX BUF (0)	H		E04P2	1-02 *					D02						3-6/8			138
D6-2	LD TX BUF (0)				1														138
D6-2	TIME OUT (1)	H		F01S2	1-01 *					D02		1	1						139
D6-2	TIME OUT (1)	H		E04S2	1-02 *					D02						3-6/8			139
D6-2	TIME OUT (1)				1														139
D8-1	SEQ 00	H		A02N1	1-01 *					D9-1		1	1						140
D8-1	SEQ 00	H		B03B1	1-02 *					D8-1						4-0/8			140
D8-1	SEQ 00				1														140
D8-1	SEQ 01	H		A02L1	1-01 *					D9-1		1	1						141
D8-1	SEQ 01	H		E03B1	1-02 *					D9-1						12-0/8			141
D8-1	SEQ 01				1														141
D8-1	SEQ 02	H		B02D2	1-01 *					D9-1		1	1						142
D8-1	SEQ 02	H		E03C1	1-02 *					D8-4						10-0/8			142
D8-1	SEQ 02				1														142
D8-1	SEQ 03	H		A02R1	1-01 *					D9-1		1	1						143
D8-1	SEQ 03	H		B03M1	1-02 *					D8-4						10-2/8			143
D8-1	SEQ 03				1														143
D8-1	SEQ 04	H		B02L2	1-01 *					D9-1		1	1						144
D8-1	SEQ 04	H		D03A1	1-02 *					D8-4						6-4/8			144
D8-1	SEQ 04				1														144
D8-1	SEQ 05	H		B02K1	1-01 *					D9-1		1	1						145
D8-1	SEQ 05	H		C03P2	1-02 *					D8-4						5-6/8			145
D8-1	SEQ 05				1														145

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RUN NAME		A/P	PIN	ORDER	PIN	BAY	ORDER	Q	DRAW	RV	PG	Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	11/26	PAGE 15
																			NUMBER
D8-1	SEQ 06	H	B02K2			1-01 *					D9-1			1					146
D8-1	SEQ 06	H	D03U1			1-02 *					D8-4								146
D8-1	SEQ 06					1										8-6/8			146
D8-1	SEQ 07	H	B02J2			1-01 *					D9-1			1					147
D8-1	SEQ 07	H	D03P1			1-02 *					D8-4								147
D8-1	SEQ 07					1										8-4/8			147
D8-1	SEQ 08	H	A02K1			1-01 *					D9-1			1					148
D8-1	SEQ 08	H	B03P2			1-02 *					D8-4								148
D8-1	SEQ 08					1										6-0/8			148
D8-1	SEQ 09	H	A02C1			1-01 *					D9-1			1					149
D8-1	SEQ 09	H	E03E1			1-02 *					D8-3								149
D8-1	SEQ 09					1										13-2/8			149
D8-1	SEQ 10	H	A02H1			1-01 *					D9-1			1					150
D8-1	SEQ 10	H	B03V1			1-02 *					D8-4								150
D8-1	SEQ 10					1										6-6/8			150
D8-1	SEQ 11	H	A02A1			1-01 *					D9-1			1					151
D8-1	SEQ 11	H	B03S1			1-02 *					D8-4								151
D8-1	SEQ 11					1										7-0/8			151
D8-1	SEQ 12	H	A02N1			1-01 *					D9-1			1					152
D8-1	SEQ 12	H	B03M1			1-02 *					D8-4								152
D8-1	SEQ 12					1										2-6/8			152
D8-1	SEQ 13	H	B02L1			1-01 *					D9-1			1					153
D8-1	SEQ 13	H	B03N1			1-02 *					D8-4								153
D8-1	SEQ 13					1										3-0/8			153
D8-1	SEQ 14	H	B02M1			1-01 *					D9-1			1					154
D8-1	SEQ 14	H	B03L1			1-02 *					D8-2								154
D8-1	SEQ 14					1										3-0/8			154
D8-1	SEQ 15	H	B02W2			1-01 *					D9-1			1					155
D8-1	SEQ 15	H	B03P1			1-02 *					D8-2								155
D8-1	SEQ 15					1										2-6/8			155
D8-3	RX SEARCH DONE	L	E01S1			1-01 *					D02			1					156
D8-3	RX SEARCH DONE	L	E03V1			1-02 *					D8-3								156
D8-3	RX SEARCH DONE					1										3-6/8			156
D8-4	00 TO RX GO/DONE	L	D03L1			1-01 *					D8-4			1					157
D8-4	00 TO RX GO/DONE	L	E01V1			1-02 *					D02								157
D8-4	00 TO RX GO/DONE					1										6-2/8			157

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RUN NAME		A/P	PIN	ORDER	PIN	BAY	ORDER	Q	DRAW	RV	PG	Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	11/26	PAGE 16
																			NUMBER
D8-4	00 TO TX GO/DONE	L	D03N1			1-01 *					D8-4			1					158
D8-4	00 TO TX GO/DONE	L	E01M1			1-02 *					D02								158
D8-4	00 TO TX GO/DONE					1										8-0/8			158
D8-4	CRA	L	D03S1			1-01 *					D8-4			1					159
D8-4	CRA	L	E01R2			1-02 *					D02								159
D8-4	CRA					1										3-4/8			159
D8-4	RX RCC 04	L	D03D1			1-01 *					D8-4			1					160
D8-4	RX RCC 04	L	E02K2			1-02 *					D9-6								160
D8-4	RX RCC 04					1										5-6/8			160
D8-4	RX RCC 05	L	D03E1			1-01 *					D8-4			1					161
D8-4	RX RCC 05	L	E02H2			1-02 *					D9-6								161
D8-4	RX RCC 05					1										5-2/8			161
D8-4	STRIP DBL CHAR	L	B03M2			1-01 *					D8-4			1					162
D8-4	STRIP DBL CHAR	L	E01U1			1-02 *					D02								162
D8-4	STRIP DBL CHAR					1										11-2/8			162
D8-4	TX BCC 04	L	F03A1			1-01 *					D8-4			1					163
D8-4	TX ACC 04	L	F02V1			1-02 *					D9-5								163
D8-4	TX BCC 04					1										7-4/8			163
D8-4	TX ACC 05	L	D03V1			1-01 *					D8-4			1					164
D8-4	TX ACC 05	L	F02P2			1-02 *					D9-5								164
D8-4	TX BCC 05					1										7-2/8			164
D8-4	TX BCC NEXT CHAR	L	D03F1			1-01 *					D8-4			1					165
D8-4	TX BCC NEXT CHAR	L	F02N2			1-02 *					D9-5								165
D8-4	TX BCC NEXT CHAR					1										8-4/8			165
D8-5	DLE RQ	L	E03P1			1-01 *					D8-5			1					166
D8-5	DLE RQ	L	F01P1			1-02 *					D02								166
D8-5	DLE RQ					1										5-4/8			166
D8-5	INH SH TX BCC	L	F02A1			1-01 *					D9-5			1					167
D8-5	INH SH TX BCC	L	F03L1			1-02 *					D8-5								167
D8-5	INH SH TX BCC					1										3-6/8			167
D8-5	PAD RQ	L	E03K1			1-01 *					D02			1					168
D8-5	PAD RQ	L	F01N1			1-02 *					D02								168
D8-5	PAD RQ					1										5-6/8			168
D8-5	TX BCC SH EN (1)	H	E02V1			1-01 *					D9-5			1					169
D8-5	TX BCC SH EN (1)	H	F03N1			1-02 *					D8-5								169
D8-5	TX BCC SH EN (1)					1										3-2/8			169

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D8-5 TX TRANS (0)		H	D03P1		1-01 *					D02		1				170
D8-5 TX TRANS (0)		H	F01R1		1-02 *					D02						170
D8-5 TX TRANS (0)					1									8-0/8		170
D8-6 RCC ON SYNC (0)		H	E02R2		1-01 *					D9-6		1				171
D8-6 RCC ON SYNC (0)		H	E03D1		1-02 *					D8-6						171
D8-6 RCC ON SYNC (0)					1									3-6/8		171
D8-6 DES RX BCC SH		L	F02J2		1-01 *					D9-6		1				172
D8-6 DES RX BCC SH		L	E03M1		1-02 *					D8-6						172
D8-6 DES RX BCC SH					1									2-6/8		172
D8-6 DLE SAVE (0)		H	E03V2		1-01 *					D8-6		1				173
D8-6 DLE SAVE (0)		H	F01U1		1-02 *					D3-1						173
D8-6 DLE SAVE (0)					1									5-4/8		173
D8-6 IT RR		L	E02L2		1-01 *				1	D9-6		1		2-3		174
D8-6 IT RR		L	F02H2		1-02 *					D9-6		2				174
D8-6 IT RR		L	F03U1		1-03 *					D8-6		1				174
D8-6 IT RR		L	F04V1		1-04 *					D9-2		2				174
D8-6 IT RR		L	F01V1		1-05 *					D8-6						174
D8-6 IT RR					1									15-7/8		174
D8-6 NOT RESTART		L	E02J1		1-01 *					D9-6		1				175
D8-6 NOT RESTART		L	F03M1		1-02 *					D8-6						175
D8-6 NOT RESTART					1									5-6/8		175
D8-6 RX TRANS		L	F02F1		1-01 *					D9-6		1				176
D8-6 RX TRANS		L	F03A1		1-02 *					D8-3						176
D8-6 RX TRANS					1									3-2/8		176
D9-1 D00		H	A02R2		1-01 *					D9-1		1				177
D9-1 D00		H	A03U2		1-02 *					D8-1						177
D9-1 D00					1									3-0/8		177
D9-1 D01		H	A02V2		1-01 *					D9-1		1				178
D9-1 D01		H	A03T2		1-02 *					D8-1						178
D9-1 D01					1									3-0/8		178
D9-1 D02		H	A03U1		1-01 *					D8-1		1				179
D9-1 D02		H	B02C1		1-02 *					D9-1						179
D9-1 D02					1									3-4/8		179
D9-1 D03		H	A03V2		1-01 *					D8-1		1				180
D9-1 D03		H	B02F1		1-02 *					D9-1						180
D9-1 D03					1									4-0/8		180

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D9-1 D04	H	A03N1		1-01 *							D8-1			1				181
D9-1 D04	H	B02E1		1-02 *							D9-1					4-0/8		181
D9-1 D04				1														181
D9-1 D05	H	A03N2		1-01 *				1		D8-1				1		1-7		182
D9-1 D05	H	B02A1		1-02 *							D9-1					4-3/8		182
D9-1 D05				1														182
D9-1 D06	H	A02V1		1-01 *							D9-1			1				183
D9-1 D06	H	A03P2		1-02 *							D8-1					3-2/8		183
D9-1 D06				1														183
D9-1 D07	H	A03P1		1-01 *							D8-1			1				184
D9-1 D07	H	B02E1		1-02 *							D9-1					4-2/8		184
D9-1 D07				1														184
D9-1 D08	H	A03D2		1-01 *							D8-1			1				185
D9-1 D08	H	B02E2		1-02 *							D9-1					5-4/8		185
D9-1 D08				1														185
D9-1 D09	H	A03D1		1-01 *				1		D8-1				1		2-4		186
D9-1 D09	H	B02D1		1-02 *							D9-1					5-5/8		186
D9-1 D09				1														186
D9-1 D10	H	A02M1		1-01 *							D8-1			1				187
D9-1 D10	H	A03B1		1-02 *							D8-1					3-6/8		187
D9-1 D10				1														187
D9-1 D11	H	A02M2		1-01 *							D9-1			1				188
D9-1 D11	H	A03C1		1-02 *							D8-1					3-4/8		188
D9-1 D11				1														188
D9-1 D12	H	A02N2		1-01 *							D9-1			1				189
D9-1 D12	H	A03K1		1-02 *							D8-1					2-6/8		189
D9-1 D12				1														189
D9-1 D13	H	A02P1		1-01 *							D9-1			1				190
D9-1 D13	H	A03J1		1-02 *							D8-1					3-2/8		190
D9-1 D13				1														190
D9-1 D14	H	A02P2		1-01 *							D9-1			1				191
D9-1 D14	H	A03H2		1-02 *							D8-1					3-2/8		191
D9-1 D14				1														191
D9-1 D15	H	A02L2		1-01 *							D9-1			1				192
D9-1 D15	H	A03L2		1-02 *							D8-1					2-6/8		192
D9-1 D15				1														192

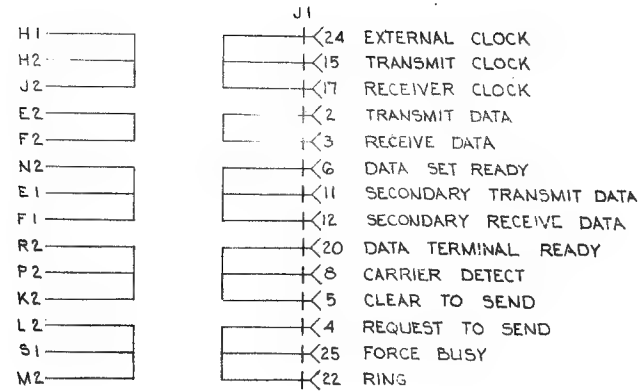
DQ11AB.E HND288.V23(23) 05/24/74										23-AUG-75	11:26	PAGE 19							
RUN NAME		A/P	PIN	NAME	ORDER	BAY	PIN	ORDER	Q	DRAW	RV	PG	Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN
																			NUMBER
D9-2	CM TO BUS	H		A03M1				1-01 *					D8-1		1				193
D9-2	CM TO BUS	H		C02L2				1-02 *					D9-2						193
D9-2	CM TO BUS							1									8-6/8		193
D9-2	INI	H		R02F2				1-01 *					D9-2		1				194
D9-2	INI	H		F03K1				1-02 *					D8-5						194
D9-2	INI							1									13-2/8		194
D9-4	BCC-DLE	L		C03S2				1-01 *					D8-5		1				195
D9-4	RCC-DLE	L		D02P2				1-02 *					D9-4		2				195
D9-4	RCC-DLE	L		D01P2				1-03 *					D02						195
D9-4	RCC-DLE							1									7-6/8		195
D9-5	BCC RQ	L		D01S2				1-01 *					D02		1				196
D9-5	BCC RQ	L		F02E1				1-02 *					D9-5						196
D9-5	BCC RQ							1									6-4/8		196
D9-5	TX C	H		F03H1				1-01 *					D8-5		1				197
D9-5	TX C	H		F02T2				1-02 *					D9-5						197
D9-5	TX C							1									6-2/8		197
D9-5	TX C	L		E03L1				1-01 *					D8-5		1				198
D9-5	TX C	L		F02R2				1-02 *					D9-5						198
D9-5	TX C							1									5-6/8		198
D9-5	TX EXIT PULSE	H		F03S1				1-01 *					D8-5		1				199
D9-5	TX EXIT PULSE	H		F02U2				1-02 *					D9-5						199
D9-5	TX EXIT PULSE							1									5-4/8		199
D9-5	TX TOTAL TRAN (0)	H		D01R2				1-01 *					D02		1				200
D9-5	TX TOTAL TRAN (0)	H		F02K1				1-02 *					D9-5		2				200
D9-5	TX TOTAL TRAN (0)	H		F03R1				1-03 *					D8-3						200
D9-5	TX TOTAL TRAN (0)							1									10-2/8		200
D9-6	H RX C	H		E02T2				1-01 *					D9-6		1				201
D9-6	H RX C	H		F03H1				1-02 *					D8-6						201
D9-6	H RX C							1									4-0/8		201
D9-6	BCC ERR	L		D01U2				1-01 *					D02		1				202
D9-6	BCC ERR	L		E02F2				1-02 *					D9-6						202
D9-6	BCC ERR							1									3-6/8		202
D9-6	DIS RX TRANSF PU	L		F01B2				1-01 *					D02		1				203
D9-6	DIS RX TRANSF PU	L		F02D1				1-02 *					D9-2						203
D9-6	DIS RX TRANSF PU							1									2-6/8		203

D011AB.E HND288.V23(23) 05/24/74																	23-AUG-75	11:26	PAGE 20
RUN NAME		A/P	PIN	NAME	ORDER	BAY	PIN	ORDER	Q	DRAW	RV	PG	Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN
																			NUMBER
D9-6	EN RX TRANSFER PU	H		E02C1				1-01 *					D9-6		1				204
D9-6	EN RX TRANSFER PU	H		F04R2				1-02 *					D3-1		2				204
D9-6	EN RX TRANSFER PU	H		F03S1				1-03 *					D8-3						204
D9-6	EN RX TRANSFER PU							1									9-6/8		204
D9-6	LD CHAM DET	L		D03R1				1-01 *					D8-3		1				205
D9-6	LD CHAM DET	L		F02A1				1-02 *					D9-6						205
D9-6	LD CHAM DET							1									5-0/8		205
D9-6	LD SEQ	L		D02R2				1-01 *					D9-6		1				206
D9-6	LD SEQ	L		D03C1				1-02 *					D8-3						206
D9-6	LD SEQ							1									3-6/8		206
D9-6	PRO RCC CYCLE	L		E02B1				1-01 *	2		D02				2				207
D9-6	PRO RCC CYCLE	L		F03S2				1-02 *			D8-6								207
D9-6	PRO RCC CYCLE							1									7-0/8		207
D9-6	RX BCC CYCLE	L		D01T2				1-01 *							1				208
D9-6	RX BCC CYCLE	L		D02H2				1-02 *							2				208
D9-6	RX BCC CYCLE	L		E03F1				1-03 *											208
D9-6	RX BCC CYCLE							1									8-6/8		208
D9-6	RX TOTAL TRAN	L		F01S1				1-01 *					D02		1				209
D9-6	RX TOTAL TRAN	L		F03D1				1-02 *					D8-6		2				209
D9-6	RX TOTAL TRAN	L		F02C1				1-03 *					D9-6						209
D9-6	RX TOTAL TRAN							1									7-2/8		209
GND 01				A01B2				1-01 *					D01		1				210
GND 01				A01C2				1-02 *					D01		2				210
GND 01				A01N1				1-03 *					D01		1				210
GND 01				A01P1				1-04 *					D01		2				210
GND 01				A01R1				1-05 *					D01		1				210
GND 01				A01S1				1-06 *					D01		2				210
GND 01				A01T1				1-07 *					D01		1				210
GND 01				A01V2				1-08 *					D01		2				210
GND 01				R01B2				1-09 *					D01		1				210
GND 01				R01C2				1-10 *					D01		2				210
GND 01				R01D1				1-11 *					D01		1				210
GND 01				R01E1				1-12 *					D01		2				210
GND 01				R01T1				1-13 *					D01		1				210
GND 01				B01V2				1-14 *					D01						210
GND 01								1									35-6/8		210

DQ11AB.E		HND2HR.V23(23) 05/24/74				23-AUG-75		1126		PAGE 21						
RUN NAME	A/P	PIN	NAME	ORDER	BAY	Q	DRW	RV	PG	Y	X	Z	REMARKS	LENGTH	EXCEPTIONS	RUN NUMBER
GND 04			A04R2		1-01 *					D01		1				211
GND 04			A04C2		1-02 *					D01		2				211
GND 04			A04N1		1-03 *					D01		1				211
GND 04			A04P1		1-04 *					D01		2				211
GND 04			A04R1		1-05 *					D01		1				211
GND 04			A04S1		1-06 *					D01		2				211
GND 04			A04T1		1-07 *					D01		1				211
GND 04			A04V2		1-08 *					D01		2				211
GND 04			B04R2		1-09 *					D01		1				211
GND 04			P04C2		1-10 *					D01		2				211
GND 04			B04D1		1-11 *					D01		1				211
GND 04			B04E1		1-12 *					D01		2				211
GND 04			B04T1		1-13 *					D01		1				211
GND 04			B04V2		1-14 *					D01		1				211
					1											

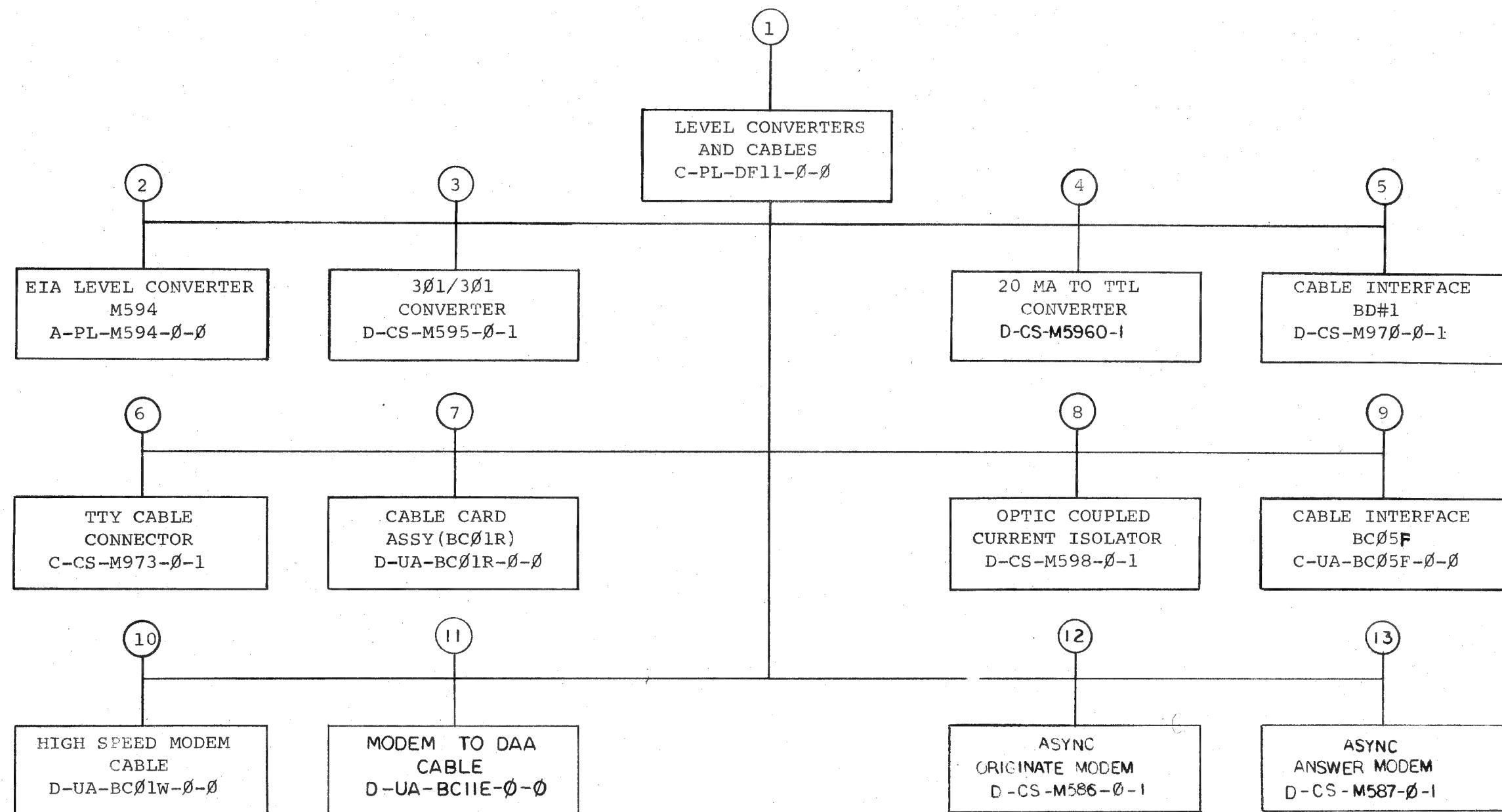
35-6/8

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CHOP
HERE

7		EYBLET FEED THRU	9006731	6
1	J1	CONN. CINCH DB-255-3	1210247	5
1		ETCHED CIRCUIT BOARD	501002C	4
		MODULE BCO HISTORY	B-MH-H315-0-6	3
		ASSY/DRILLING HOLE LAYOUT	C-AH-H315-0-5	2
		X-Y COORDINATE HOLE LOCATION	K-CO-H315-0-4	1
QTY	REF. DESIGNATION	DESCRIPTION	DEC PART NO.	ITEM NO.
		PARTS LIST		
QTY	REF DESIGNATION	DESCRIPTION	PART NO.	ITEM NO.
PARTS LIST				
ETCH BOARD REV A				
DRN	ROGER J. J. J.	DATE	3-9-72	
CHKD	J. J. J.	DATE	2-16-72	
ENG	J. J. J.	DATE	3-13-72	
PROD	J. J. J.	DATE	3-13-72	
NEXT HIGHER ASSY				
SCALE				
SHEET OF				
DIST.				
digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS				
TITLE MODEM TEST CONNECTOR				
SIZE CODE NUMBER REV. DCS H315-0-1				



TITLE	SHEET 2 OF 4	SIZE	CODE	NUMBER	REV
LEVEL CONVERTERS AND CABLES		B	DD	DF11-0	E

CUSTOMER PRINT SET				ELECTRICAL					CUSTOMER PRINT SET				ELECTRICAL								
DF11-1				MFG. SET	FIND NO.	DRAWING NO.	REV	NO OF SHT	DESCRIPTION	OPTION NO./FILE DATE	DF11-1				MFG. SET	FIND NO.	DRAWING NO.	REV	NO OF SHT	DESCRIPTION	OPTION NO./FILE DATE
X					1	C-PL-DF11-Ø-Ø	F	1	LEVEL CONVERTERS AND CABLES								D-AH-M973-Ø-5		1	ASSY/DRILLING HOLE LAYOUT	
X						A-SP-DF11-Ø-1	B	10	ENGINEERING SPEC								B-MH-M973-Ø-6		1	MODULE ECO HISTORY	
						A-SP-DF11-Ø-2	C	16	ACCEPTANCE PROCEDURE												
						A-SP-DF11-Ø-3	*	2	OPTION TEST PROCEDURE												
											X					7	D-UA-BCØ1R-Ø-Ø	#	1	CABLE CARD ASSY (BCØ1R)	
																	C-CS-BCØ1R-Ø-2		1	BCØ1R-25	
																	B-SP-BCØ1R-Ø-3		1	TEST PROCEDURE	
X					2	A-PL-M594-Ø-Ø	#	1	EIA LEVEL CONVERTER M594												
X						C-CS-M594-Ø-1	#	1	EIA LEVEL CONVERTER M594		X					8	D-CS-M598-Ø-1	#	1	OPTIC COUPLED CURRENT ISOLATOR	
						K-CO-M594-Ø-4		1	X-Y COORDINATE HOLE LOCATION								K-CO-M598-Ø-4		1	X-Y COORDINATE HOLE LOCATION	
						D-AH-M594-Ø-5		1	ASSY/DRILLING HOLE LAYOUT								D-AH-M598-Ø-5		1	ASSY/DRILLING HOLE LAYOUT	
						B-MH-M594-Ø-6		1	MODULE ECO HISTORY								B-MH-M598-Ø-6		1	MODULE ECO HISTORY	
						A-ML-M594-T		1	M594 TESTER								5009823		1	ETCHED CIRCUIT BOARD	
																	A-ML-M598-T		1	M598 TESTER	
																	A-SP-M598-Ø-8		9	M598 SPECIFICATIONS	
X					3	D-CS-M595-Ø-1	#	2	3Ø1/3Ø3 CONVERTER								B-CS-M598-Ø-2		1	M598 TESTER	
						K-CO-M595-Ø-4		1	X-Y COORDINATE HOLE LOCATION												
						D-AH-M595-Ø-5		1	ASSY/DRILLING HOLE LOCATION												
						B-MH-M595-Ø-6		1	MODULE ECO HISTORY												
						B-SP-M595-Ø-7		3	TEST PROCEDURE		X					9	C-UA-BCØ5F-Ø-Ø	#	1	CABLE INTERFACE BCØ5F	
																	B-CS-BCØ5F-Ø-2		1	CIRCUIT SCHEMATIC	
																	B-SP-BCØ5F-Ø-3		1	TEST PROCEDURE	
X					4	D-CS-M596Ø-Ø-1	#	2	20 MA TO TTL CONVERTER												
						K-CO-M596Ø-Ø-4		1	X-Y COORDINATE HOLE LOCATION												
						D-AH-M596Ø-Ø-5		1	ASSY/DRILLING HOLE LAYOUT												
						B-MH-M596Ø-Ø-6		1	MODULE ECO HISTORY		X					10	D-UA-BCØ1W-Ø-Ø	#	1	HIGH SPEED MODEM CABLE	
X					5	D-CS-M97Ø-Ø-1	#	1	CABLE INTERFACE BD #1												
						K-CO-M97Ø-Ø-4		1	X-Y COORDINATE HOLE LOCATION		X					11	D-UA-BC11E-Ø-Ø	#	1	MODEM TO DAA CABLE	
						D-AH-M97Ø-Ø-5		1	ASSY/DRILLING HOLE LAYOUT												
						B-MH-M97Ø-Ø-6		1	MODULE ECO HISTORY												
X					6	C-CS-M973-Ø-1	#	1	TTY CABLE CONNECTOR												
						K-CO-M973-Ø-4		1	X-Y COORDINATE HOLE LOCATION												

CUSTOMER PRINT SET CODES	X = PRINT OF DOCUMENT INCLUDED IN PRINT SET C = INCLUDES ALL PRINTS INDICATED ON DOCUMENT S = CONFIDENTIAL AUTHORIZED SIGNATURE REQUIRED	TITLE	SHEET 3 OF 4	SIZE	CODE	NUMBER	REV
		LEVEL CONVERTERS AND CABLES		B	DD	DF11-Ø	E

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DIGITAL EQUIPMENT CORPORATION
MAYNARD, MASSACHUSETTS

ENGINEERING SPECIFICATION

DATE June 30, 1972

TITLE DF11 Serial Line Signal Conditioning Options

REVISIONS

REV	DESCRIPTION	CHG NO	ORIG	DATE	APPD BY	DATE
A	ECO CHANGE	DF11-00005	McNAMARA	8/72	J. M. Hammer	9/5/72
B	ECO CHANGE	DF11-00009	DIETER	4/74	J. M. Hammer	6/5/74

ENG	APPD	SIZE	CODE	NUMBER	REV
		A	SP	DF11-0-1	B

ENGINEERING SPECIFICATION

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CONTINUATION SHEET

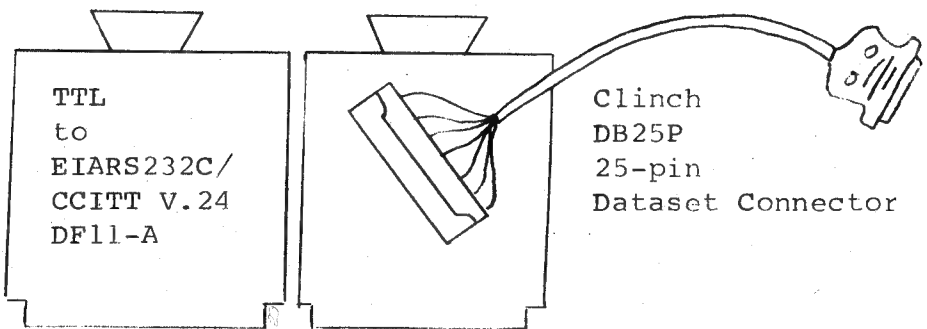
TITLE DF11 Serial Line Signal Conditioning Options

I. General

Modern digital computers handle almost all data signals as Transistor-Transistor Logic (TTL) levels. These levels must then be converted to other voltage levels or current values to prepare them for application to communications media so that they can be transmitted to a distant processor or terminal. In addition to the need for level conversion, there is a requirement to have cables of various lengths equipped with a variety of specialized fittings for each communications medium serviced.

A DF11 unit will normally consist of two single height (8-1/2" by 3") modules. One module performs the electrical signal conditioning function of converting from TTL signal levels to the external signal levels required (e.g. EIA RS-232-C, 20 milliamperes current loop, Bell System CBS or CDT Data Access Arrangements, etc.). The second module performs the physical interface function; i.e. furnishes a cable to connect the level-converted signals produced by the first module to the desired device or channel. In the case of the DF11-A RS-232-C/CCITT Recommendation V24 Interface, the second module provides a 25-conductor cable and plug to connect the level-converted signals on the back panel wires to the dataset.

Dataset
Interface
for units
requiring
EIA/RS232C
or CCITT
voltage
levels



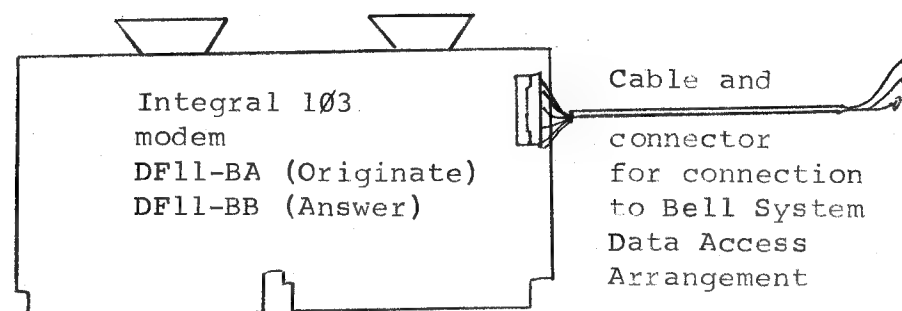
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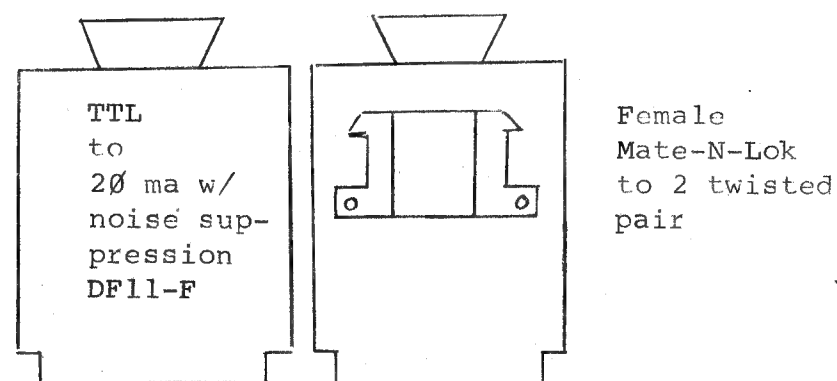
CONTINUATION SHEET

TITLE DF11 Serial Line Signal Conditioning Options

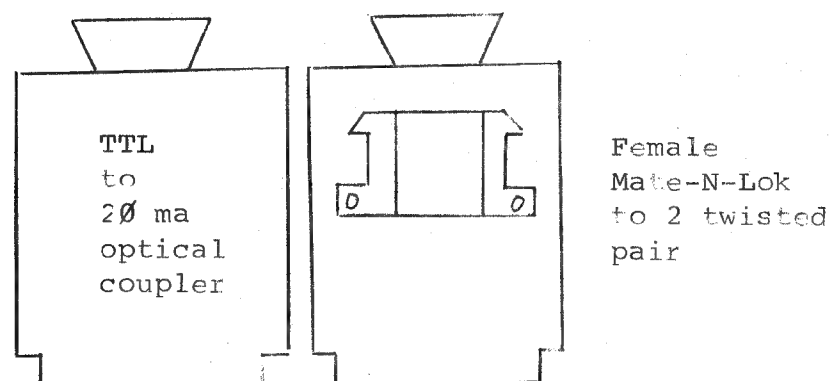
Integral Modem
converts TTL to
tone signals for
transmission on
voice-grade lines.



20 ma,
local
teleprinter
(mechanical
distributor,
such as Teletype®
Model 33, 35



20 ma
optical coupler
active or
passive mode



® "Teletype" is a registered trademark of Teletype
Corporation, Skokie, Illinois

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CONTINUATION SHEET

TITLE DF11 Serial Line Signal Conditioning Options

II. Variations

DF11-A TTL to EIA RS-232-C/CCITT V24

This option consists of an M594 module and a BC01R
cable assembly. (A BC05C cable and M971 module may
be supplied as equivalent to a BC01R).

DF11-BA TTL to audio frequency shift keyed tone signals.

This option consists of an M586 module (integral
103-type modem in the Originate-Only mode).
Twenty-five foot cable and connector provided for
connection with Bell System Data Access arrangement
CDT or private wireline channels.

DF11-BB TTL to audio frequency shift keyed tone signals.

This option consists of an M587 module (integral
103-type modem in the Answer-Only mode). Twenty-five
foot cable and connector provided for connection with
Bell System Data Access arrangements CBS or CDT.

DF11-F TTL to 20 milliamper active local Teletype® loop.

This option consists of an M596 module and an M973.
The M973 has an Amp Mate-N-Lok connector mounted on
it for connection with customer supplied 22 AWG, 2
twisted pair cable to a local or remote Model 33 or
35 Teletype®. Reader Run control leads are not pro-
vided.

DF11-G TTL to Bell System 301/303 Dataset Interface. Signal
levels, cable connector, and signal pinning compatible
with the Bell 301/303 Datasets.

This option consists of an M595 module and a twenty-
five foot coaxial cable.

DF11-K TTL to active or passive 4-wire current mode (20 ma)
loop.

This option consists of an M598 optical coupler
module and an M973 Mate-N-Lok module.

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A	SP	DF11-0-1	B

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TITLE DF11 Serial Line Signal Conditioning Options

III. Specifications

Temperature: All DF11 modules will operate from 10°C to 50°C with relative humidity from 20% to 95% (without condensation).

Speed & Distance:

DF11-A 9600 baud at 50 feet with DEC supplied cable.

DF11-BA 300 baud with 0 dbm to -50 dbm received signal level when used with CDT data access arrangement, 300 baud with 0 dbm to -50 dbm received signal level when used on private wires. Transmit level is 0 to -12 dbm pot adjustable.

DF11-BB 300 baud with 0 dbm to -50 dbm received signal level when used either with CBS, CDT,

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TITLE DF11 Serial Line Signal Conditioning Options

or private wires. Transmit level is 0 to -12 dbm pot adjustable.

DF11-F 110 baud at 5000 feet 22 AWG twisted pair telephone cable when inserted jumpers are in place (TTY noise filter). 2400 baud at 3000 feet with 22 AWG "QUAD" wire (DEC PN 9105856-4) and using the DF11-K (Passive transmit and receive) at the other end.

DF11-G 250K baud with DEC-supplied 25 foot cable.

DF11-K 2400 baud at 1500 feet of 22 AWG twisted pair telephone cable.

NOTE: The data rates and distances cited above are those warranted by Digital. They are applicable in electrically quiet environments and do not necessarily represent limiting values. Jumpers on M5960 (DF11-F) must be cut for speeds above 110 baud.

IV. Applications:

	DC11	DL11*	DM11	DP11	LA30S
DF11-A	YES	2	YES	YES	YES
DF11-BA	1	1	3	NO	YES
DF11-BB	1	1	YES	NO	3
DF11-F	YES	2	YES	4	5
DF11-G	NO	NO	NO	YES	NO
DF11-K	YES	YES	YES	4	YES

* DL11 refers to DL11 in DD11B system unit or 11/05.

NOTES: 1. The DF11-BA and DF11-BB require +15 volts and -15 volts. They may be used with the DC11 and DL11 only if these voltages are available.

2. The DL11 contains its own active 20 ma and EIA interface circuits. While the DF11-A or DF11-F could be used, it would be a duplication of equipment.

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A	SP	DF11-0-1	B

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DF11 Serial Line Signal Conditioning Options

3. It is anticipated that the DF11-BA will be used in terminals such as the LA30S and the DF11-BB will be used in processor options such as the DM11. Technically, they could be used in the reverse order, but this would not be recommended, since the DF11-BA does not have auto-answer capability.
4. No applications have been found for the DF11-F and DF11-K with synchronous controls due to clocking problems.
5. The DF11-F is "active" only and hence would not typically be used in a terminal.

V. Connectivity:

	DF11-A	DF11-BA	DF11-BB	DF11-F	DF11-G	DF11-K
DF11-A	1	NO	NO	NO	NO	NO
DF11-BA	NO	NO	YES	NO	NO	NO
DF11-BB	NO	YES	NO	NO	NO	NO
DF11-F	NO	NO	NO	NO	NO	YES
DF11-G	NO	NO	NO	NO	NO	NO
DF11-K	NO	NO	NO	2	NO	2

NOTES: 1. Null modem required (H312A)
2. See "Active" vs. "Passive"

VI. "Active" vs. "Passive"

In 20 ma transmission, information is transmitted by means of switching on and off a current flow. To do this, a current source is used; a switch is used; and a current flow detector is required.

In the classical 20 ma device, the Model 33 or 35 Teletype®, the keyboard encoding mechanism contains the "switch" and the printer driver mechanism includes a "current detector". The typical computer console Teletype® control contains a source plus current detector in its receiver circuitry and a source plus switch in its transmitter circuitry. Since the receiver

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ACODE
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DF11-0-1REV
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DF11 Serial Line Signal Conditioning Options

contains the source, it is referred to as an "active" receiver. Since the transmitter contains a source, it too is referred to as "active". All DEC console teletype controls, and the DF11-F are "active" 20 ma interfaces.

The DF11-K, however, has its greatest volume of use in the LA30S, where it is necessary to simulate a Teletype® interface; i.e., a switch on the transmit leg and a detector on the receive leg. Since there are no sources, the DF11-K is referred to as a "passive" 20 ma interface. Jumpers are provided to connect sources into the receiver circuitry, the transmit circuitry, or both.

When used with a console teletype control or a DF11-F, the DF11-K should be left in passive transmit/passive receive mode. When two DF11-K's talk to each other, the active transmit/passive receive mode is recommended. Be sure to arrange the leads so that the receiver of one is connected to the transmitter of the other, etc.

VII. Pinning Assignments

The following pinning assignments apply to the DF11 series, although individual DF11 options may not use them all:

Cable Slot ("A" slot in DC11, 11/05) ("B" slot in (LA30, DH11, DM11))

A1	Do Not Use
B1	Do Not Use
C1	Transmitted Data +
D1	Transmitted Data -
E1	Secondary Transmitted Data EIA
F1	Secondary Received Data EIA
H1	Transmit Signal Element Timing DTE EIA
J1	Received Data +
K1	Secondary Clear To Send*
L1	Secondary Request To Send*
M1	Signal Quality Detector*
N1	Received Data -
P1	Secondary Receive Line Signal Detector*
R1	
S1	Force Busy EIA
T1	Ground
U1	
V1	UK Special Systems

SIZE
ACODE
SPNUMBER
DF11-0-1REV
B

ENGINEERING SPECIFICATION		digital		CONTINUATION SHEET	
TITLE DF11 Serial Line Signal Conditioning Options					
A2 Do Not Use					
B2 Do Not Use					
C2 Ground					
D2 DO NOT USE					
E2 Transmitted Data EIA					
F2 Received Data EIA					
H2 Transmit Signal Element Timing DCE EIA					
J2 Receive Signal Element Timing EIA					
K2 Clear To Send EIA					
L2 Request To Send EIA					
M2 Ring Indicator EIA					
N2 Data Set Ready EIA					
P2 Received Line Signal Detect EIA					
R2 Data Terminal Ready EIA					
S2 Data Signalling Rate Selector*					
T2 Ground					
U2 Select Standby*					
V2 UK Special Systems					
* Signals shown with an asterisk have no level conversion module pin assignments. If implemented, these signals would have to be level converted elsewhere.					
Converter Slot ("B" slot in DC11, 11/05) ("A" slot in LA30, DM11, DM11)					
A1 Response Control for EIA Receivers					
B1 Carrier Detect TTL					
C1 Ring Indicator TTL					
D1 Received Data TTL					
E1 Secondary Received Data TTL					
F1 Received Signal Element Timing EIA					
H1 Receive Signal Element Timing TTL					
J1 Transmit Signal Element Timing DCE EIA					
K1 Transmit Signal Element Timing DCE TTL					
L1 Transmitted Data +					
M1 Transmitted Data -					
N1 Received Data +					
P1 Received Data -					
R1 Transmit Signal Element Timing DTE TTL					
S1 Transmit Signal Element Timing DTE EIA					
T1 Ground					
U1 Secondary Transmitted Data EIA					
V1 Transmitted Data EIA					
A2 +5 (250MA MAX)					
SIZE		CODE	NUMBER	REV	
A		SP	DF11-0-1	B	

ENGINEERING SPECIFICATION		digital		CONTINUATION SHEET	
TITLE DF11 Serial Line Signal Conditioning Options					
B2 -15 (155MA MAX)					
C2 Ground					
D2 Data Set Ready TTL					
E2 Data Set Ready EIA					
F2 Clear To Send TTL					
H2 Carrier Detect EIA					
J2 Receive Data EIA					
K2 Ring Indicator EIA					
L2 Secondary Receive Data EIA					
M2 Clear To Send EIA					
N2 +15 (140MA MAX)					
P2 Data Terminal Ready TTL					
R2 Data Terminal Ready EIA					
S2 Request To Send TTL					
T2 Request To Send EIA					
U2 Secondary Transmitted Data TTL					
V2 Transmitted Data TTL					
VIII. Notes:					
1. Caution should be exercised in ordering DF11 options as add-on's to systems using the DM11 distribution panel. In systems where the customer uses 20 ma or EIA without modem control, a single level conversion module serves four lines. If the customer desires some other type of level conversion, and orders a DF11 series device to do it, that DF11 device must be added in a four-line group for which level conversion is presently not implemented, or the four-line group into which it is introduced must be converted to per-line level conversion. This is necessary to prevent the new level converter and the old "one-per-four-lines" converter from trying to level convert the same line.					
2. The DF11 modules are located in the following locations in the following options:					
Option		Converter Slot		Cable Slot	
DC11 Line Unit 1		D01		C01	
Line Unit 2		D04		C04	
DP11		D04		C04	
DM11 Distribution					
Line 00 - 15		A06 - A21		B06 - B21	
LA30		A18		B18	
11/05		B01		A01	
DD11B		B02		A02	
		B03		A03	
SIZE		CODE	NUMBER	REV	
A		SP	DF11-0-1	B	

DIGITAL EQUIPMENT CORPORATION

MAYNARD, MASSACHUSETTS

PARTS LIST

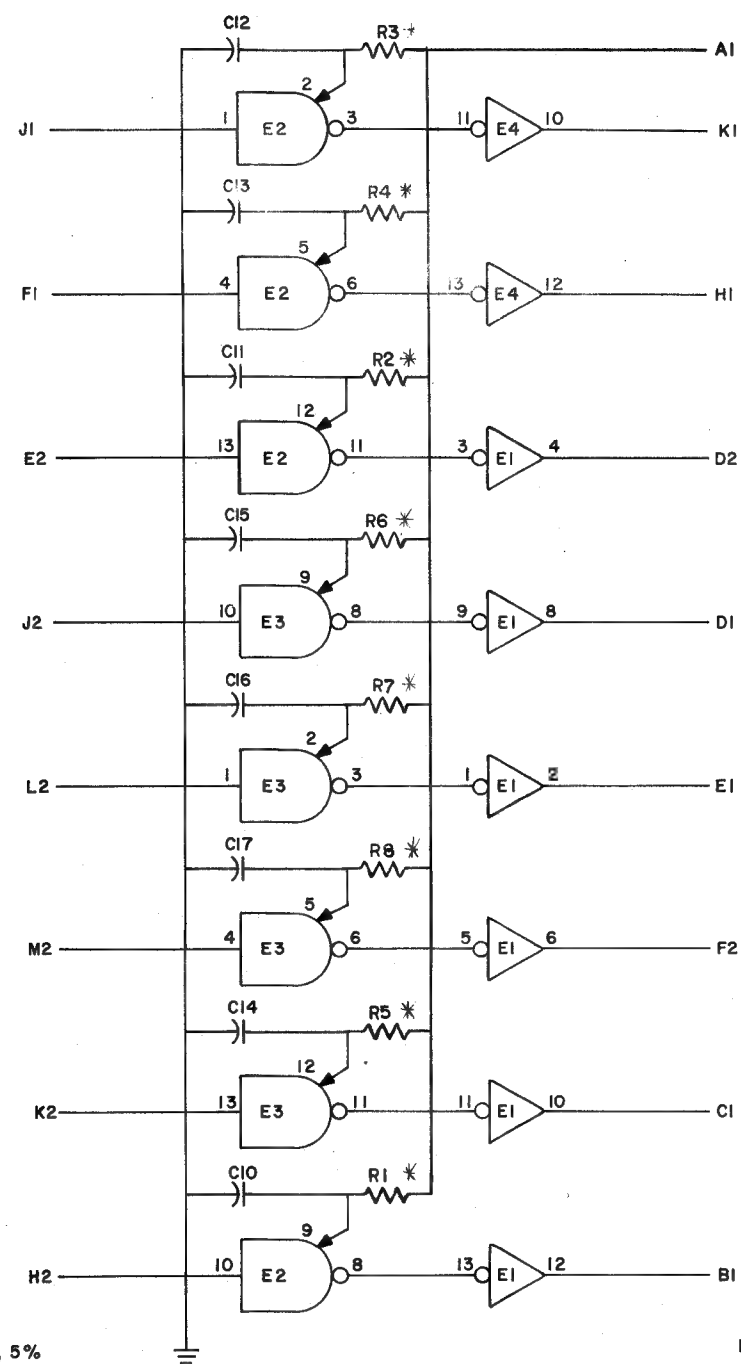
MADE BY	M.A. Gilbert	CHECKED	R. Wald	SECTION
DATE	3/12/71	DATE	3/12/71	
ENG	R. Lisie	PROD	R. Silverman	ISSUED SECT.
DATE	3/16/71	DATE	6/14/71	

QUANTITY / VARIATION

[illegible]

DEC FORM NO.16-1031
DRA 110

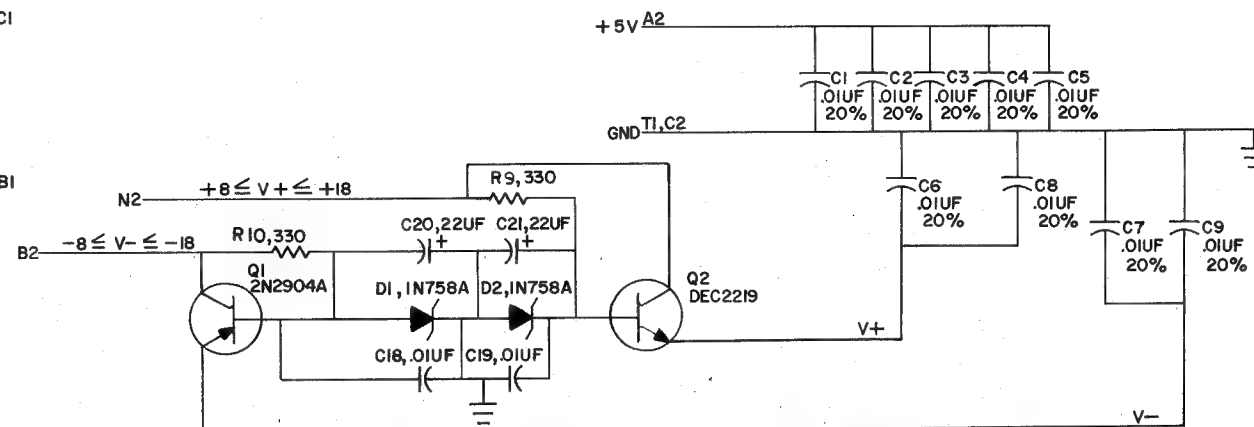
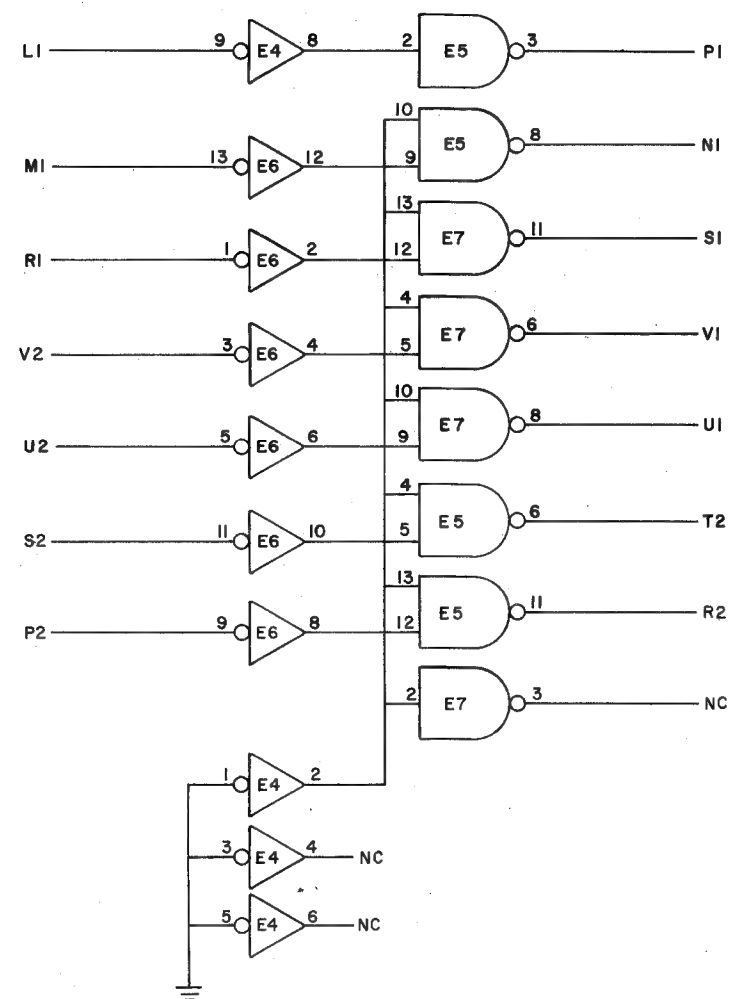
④



UNLESS OTHERWISE INDICATED:
CAPACITORS ARE 470 PF, 100V, 5%

E1, E4, E6 = DEC7404
E5, E7 = DEC1488L
E2, E3 = DEC1489L
PIN 7 = GND ON E1-E4, E6
PIN 14 = +5V
PIN 1 = -1V
PIN 7 = GND ON E5, E7
PIN 14 = +V

* NOTE
R1 → R8 INSERTED FOR YB VAR.
A1 MUST BE TIED TO -15V FOR
3V HYSTERESIS.



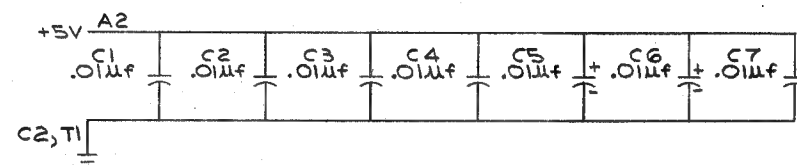
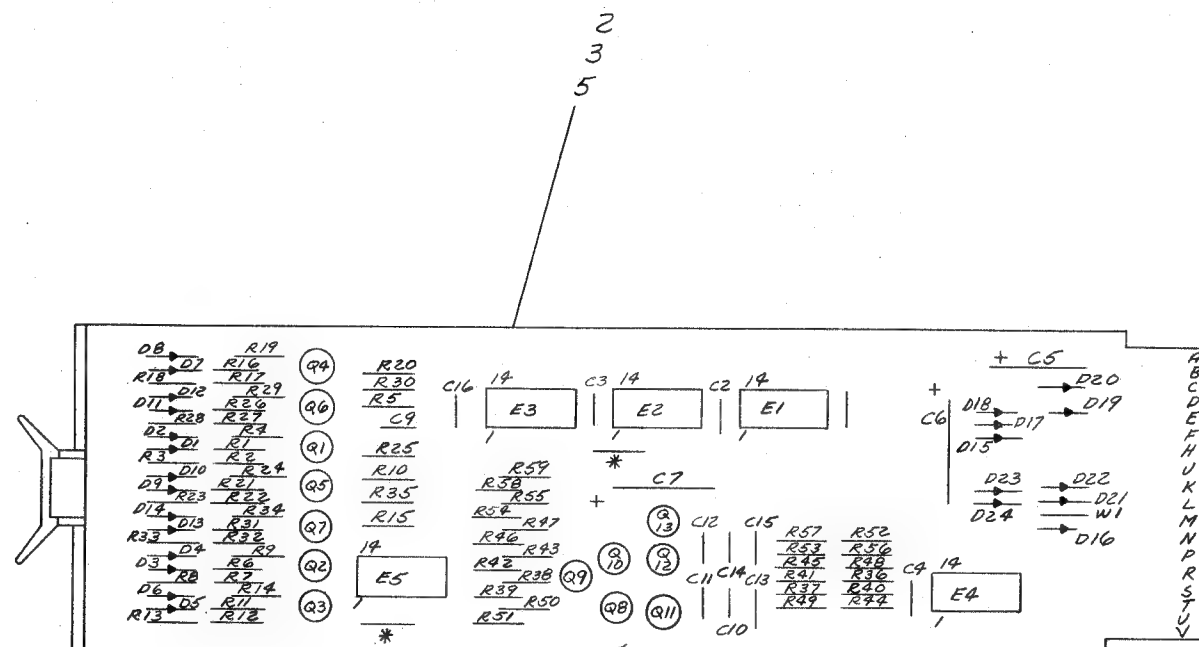
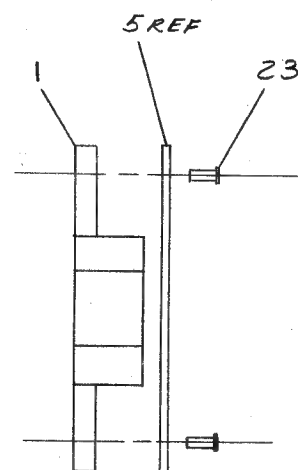
REV	CHG	NO	REV
1	00001	A	
2	00002	B	
3	00003	C	
4	00004	D	
5	00005	E	
6	00006	F	
7	00007	G	
8	00008	H	
9	00009	I	
10	00010	J	
11	00011	K	
12	00012	L	
13	00013	M	
14	00014	N	
15	00015	O	
16	00016	P	
17	00017	Q	
18	00018	R	
19	00019	S	
20	00020	T	
21	00021	U	
22	00022	V	
23	00023	W	
24	00024	X	
25	00025	Y	
26	00026	Z	

DRN.	S. COOPER	DATE	3/11/71
CHKD.	R. LEE	DATE	3/11/71
ENG.	R. LEE	DATE	3-11-71
PROD.		DATE	

TRANSISTOR & DIODE CONVERSION CHART			
DEC	EIA	DEC	EIA
IN758A	SAME		
DEC2219	2N2219		
2N2904A	SAME		

digital	EQUIPMENT CORPORATION
MAYNARD, MASSACHUSETTS	

TITLE EIA LEVEL CONVERTER M594			
SIZE	CODE	NUMBER	REV.
C	CS	M594-0-1	D
PRINTED CIRCUIT REV.			B

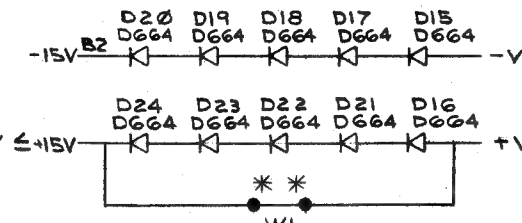
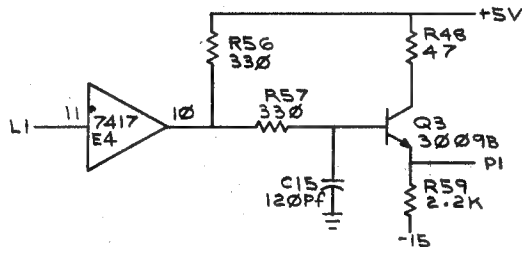
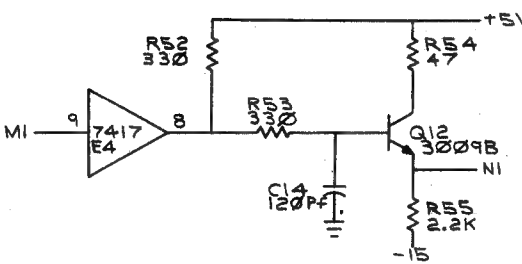
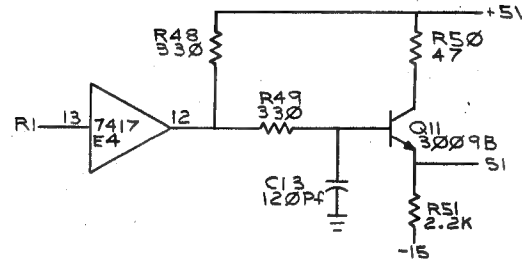
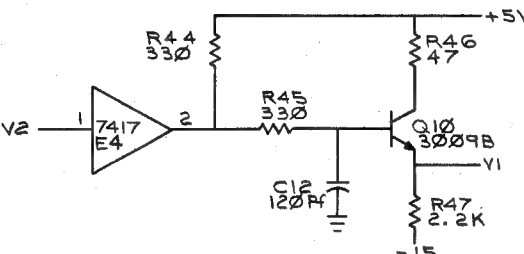
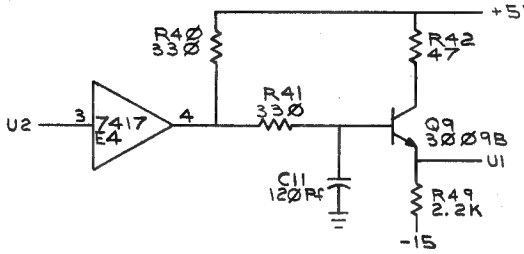
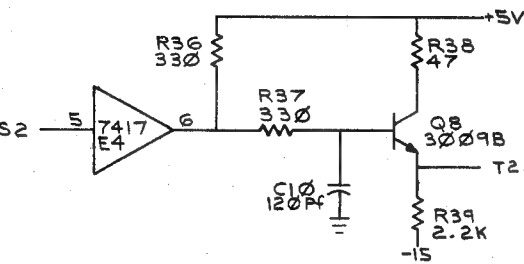
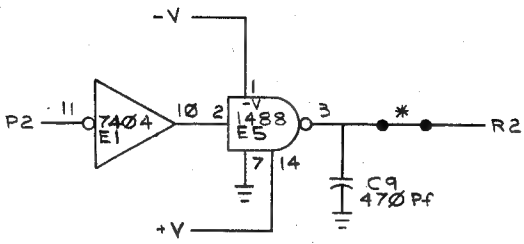
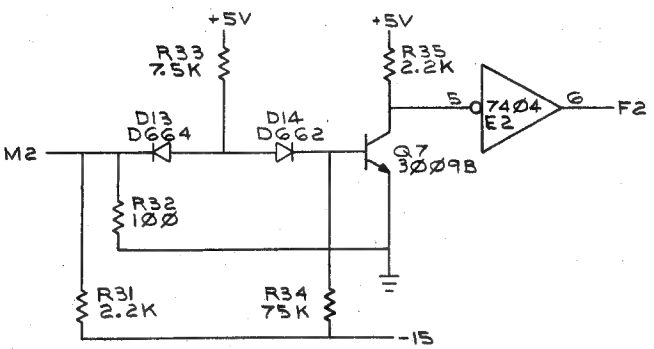
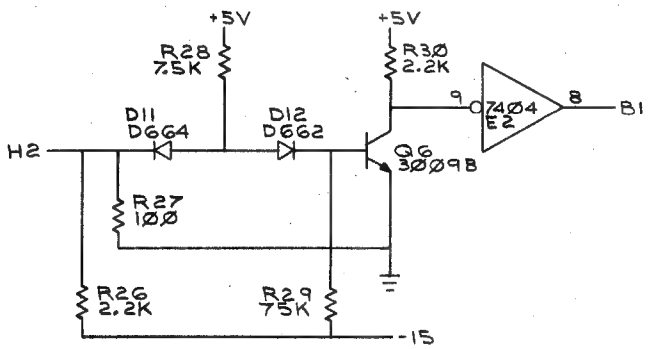
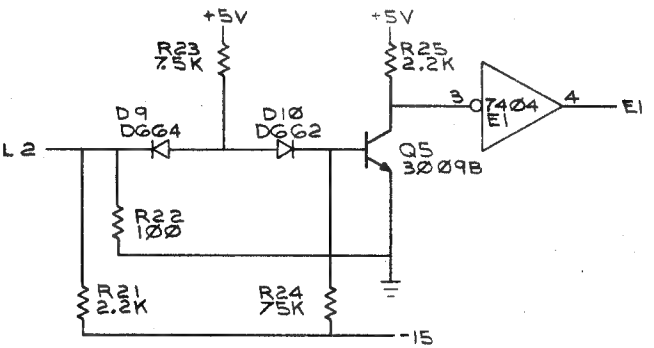
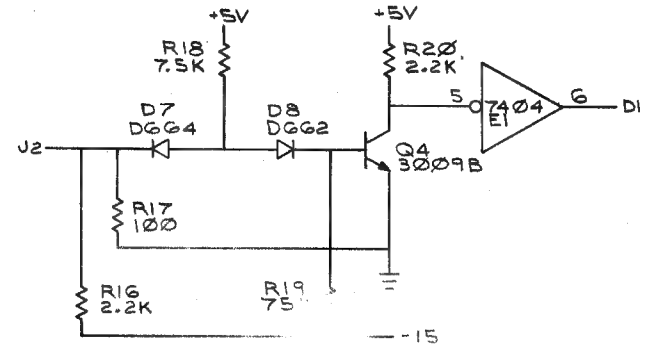
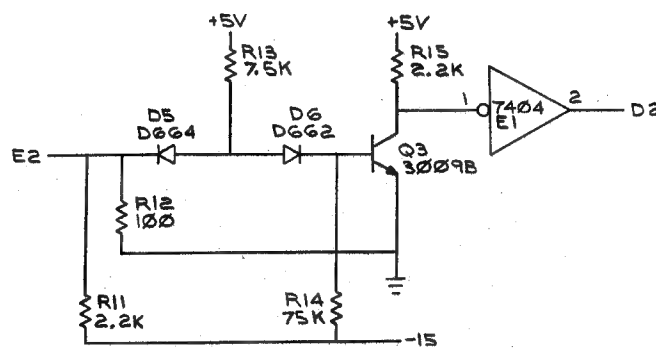
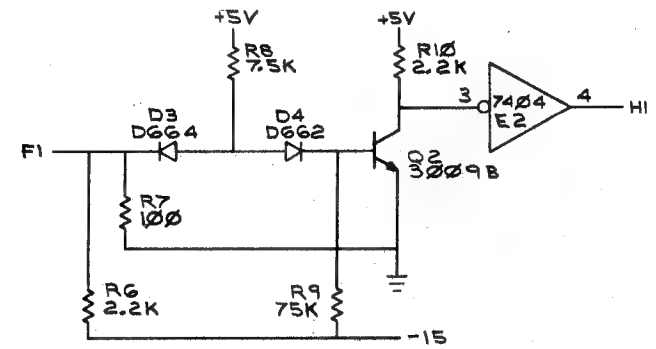
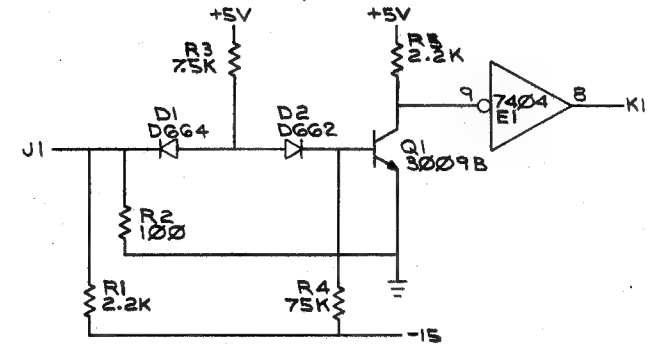
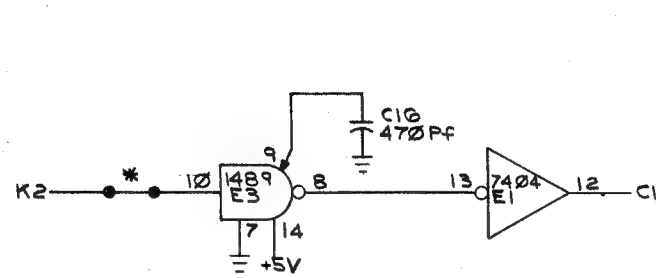


QTY	REF DESIGNATION	DESCRIPTION	PART NO.	ITEM NO.
2		EYELET G54-7	9006732	23
1	E5	I.C. DEC 148B	1910322	22
1	E4	I.C. DEC 7417	1909929	21
1	E3	I.C. DEC1489	1910323	20
2	E1, E2	I.C. DEC 7404	1909686	19
13	Q1-Q13	TRANS. DEC 3009B	1503100	18
6	R38, R42, R46, R50, R54, R58	RES. 47 1/4W 5%	1300202	17
12	R36, R37, R40, R41, R44, R45, R48, R49, R52, R53, R56, R57	RES. 330 1/4W 10%	1300293	16
7	R4, R9, R14, R19, R24 R29, R34	RES. 75K 1/4W 5%	1304841	15
7	R3, R8, R13, R18 R23, R28, R33	RES. 7.5K 1/4W 5%	1301422	14
7	R2, R7, R12, R17, R22 R27, R32	RES. 100 1/4W 10%	1300231	13
20	R1, R5, R6, R10, R11 R15, R16, R20, R21, R25 R26, R30, R31, R35, R39 R43, R47, R51, R55, R59	RES. 2.2K 1/4W 5%	1300417	12
8	D2, D4, D6, D8, D10, D12, D14, D16	DIODE D662	1100113	11
16	D1, D3, D5, D7, D9, D11, D13, D15, D17-D24	DIODE D664	1100114	10
6	C10-C15	CAP. 120 PF 100V 5% DM	1000018	9
2	C9, C16	CAP. 470 PF 100V 5% DM	1000024	8
3	C3-C7	CAP. 6.8MFD 35V 20% TANT	1000067	7
4	C1-C4	CAP. .01MFD 100V 20% DSK.	1001610	6
1		ETCHED CIRCUIT BOARD	5009872	5
REF		MODULE ECO HISTORY	B-MH-M595-0-6	4
REF		ASSY/DRILLING HOLE LAYOUT	D-MH-M595-0-5	3
REF		X-Y COORDINATE HOLE LOC.	K-CO-M595-0-4	2
1		HANDLE, FLIP CHIP MAGENTA	9008337-06	1

[illegible][illegible]

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1-0-969W S012



* MACHINE INSERTED JUMPER:
ETCH BOARD #303
REMOVE JUMPER IF USED WITH 301

* * MAY BE REMOVED IF INPUT
VOLTAGE > +12 VOLTS

FIRST USED ON OPTION/MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
DF11-G				
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES. TOLERANCES	DRN CHK ENG. PROJ. ENG. PROD.	DATE 5-12-72 5-30-72 5-30-72 5-30-72	PARTS LIST	
DECIMALS .XXX = .005 .XX = .02 .X = .1	ANGLES ± 0° 30'		digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS	
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY			TITLE 301/303 CONVERTER	
MATERIAL	NEXT HIGHER ASSY.		SIZE CODE	NUMBER
FINISH			D CS	M595-0-1
	SCALE			REV. A
	SHEET 2 OF 2			

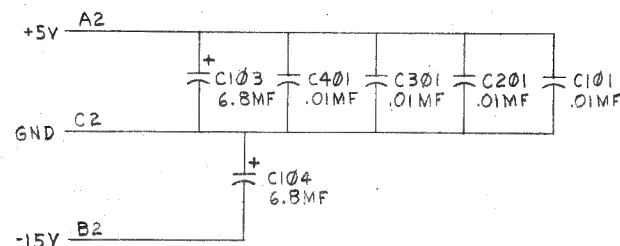
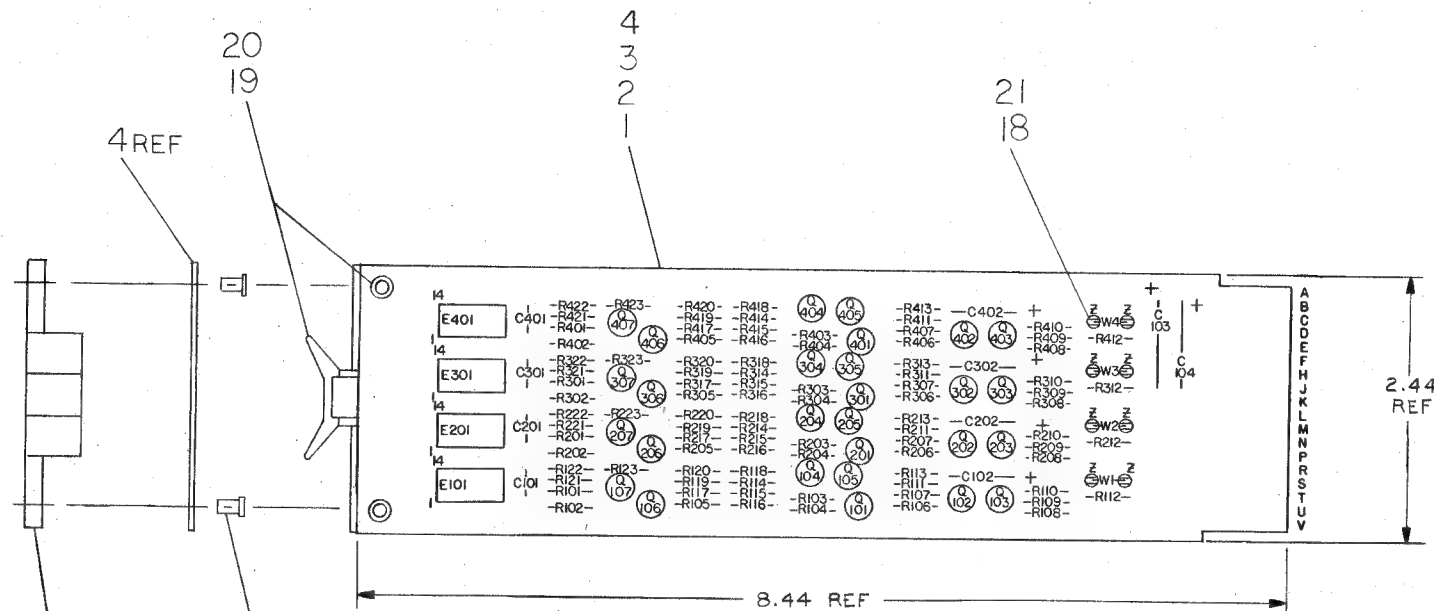
BRUNING 40-322 15640
REV. 1
CHANGE NO.
CHK

DEC FORM NO
DRD 102-B

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NOTES:

1. UNLESS OTHERWISE STATED RESISTANCE IS IN OHMS.



IC TYPE	GND	+ 5V
DEC 11380	1	8
GND AND 5V ARE USUALLY PIN 7 AND 14 RESPECTIVELY. EXCEPTIONS ARE STATED ABOVE.		
IC PIN LOCATIONS		

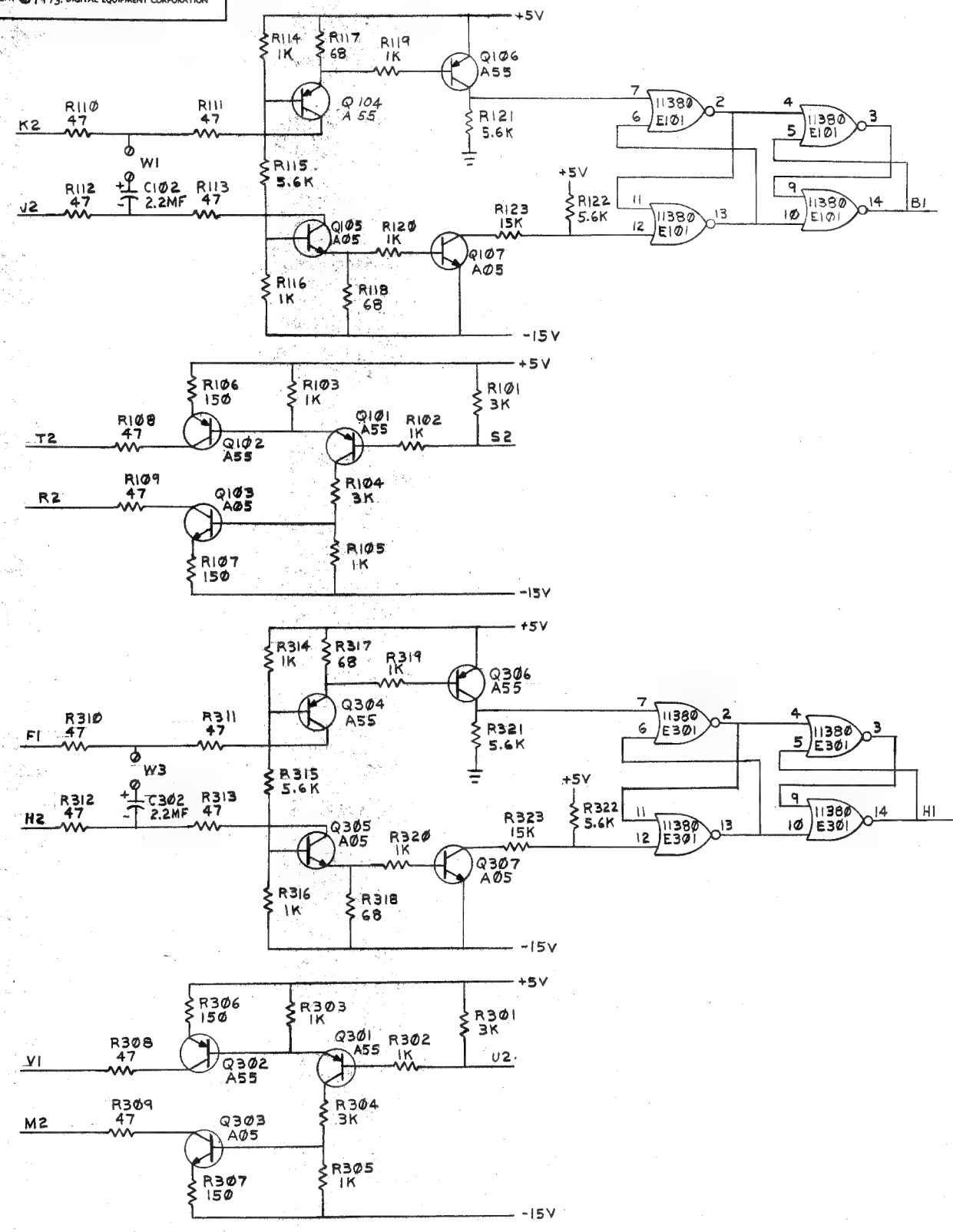
REF		X-Y COORDINATE HOLE LOCATION	K-CO-M5960-B-4	1
REF		ASSY/DRILLING HOLE LAYOUT	D-AH-M5960-B-5	2
REF		MODULE ECO HISTORY	B-M5960-B-6	3
1		ETCHED CIRCUIT BOARD	5010827	4
4	C101,C201,C301,C401	CAP .01 MF 100V 20% DISC	1001610-01	5
4	C102,C202,C302,C402	CAP 2.2 MF 35V 10% TANT	1002431	6
2	C103,C104	CAP 5.8 MF 35V 10% TANT	1005306	7
24	R108-R113,R208-R213,R308-R313,R408-R413	RES 47 OHMS 1/4W 5%	1300202	8
8	R117,R118,R217,R218,R317,R318,R417,R418	RES 68 OHMS 1/4W 5%	1300219	9
8	R106,R107,R206,R207,R306,R307,R406,R407	RES 150 OHMS 1/4W 5%	1300250	10
28	R102,R103,R105,R114,R116,R119,R120,R202,R203,R205,R214,R216,R219,R220,R302,R303,R305,R314,R316,R319,R320,R402,R403,R405,R414,R416,R419,R420	RES 1K OHMS 1/4W 5%	1300365	11
8	R101,R104,R201,R204,R301,R304,R401,R404	RES 3K OHMS 1/4W 5%	1300432	12
4	R123,R223,R323,R423	RES 15K OHMS 1/4W 5%	1300496	13
12	R115,R121,R122,R215,R221,R222,R315,R321,R322,R415,R421,R422	RES 5.6K OHMS 1/4W 5%	1301874	14
12	Q103,Q105,Q107,Q203,Q205,Q207,Q303,Q305,Q307,Q403,Q405,Q407	TRANS MPSA05	1510705	15
16	Q101,Q102,Q104,Q106,Q201,Q202,Q204,Q206,Q301,Q302,Q304,Q306,Q401,Q402,Q404,Q406	TRANS MPSA55	1510706	16
4	E101,E201,E301,E401	I.C. DEC 11380	1911113	17
8		SPLIT LUG	9006735	18
2		EYELET	9006732	19
1		HANDLE FLIP CHIP (MAGENTA)	9008337-6	20
4	W1,W2,W3,W4	BUSS WIRE #22 AWG	9107560-01	21

QTY	REF DESIGNATION	DESCRIPTION	PART NO.	ITEM NO.
PARTS LIST				
FIRST USED ON OPTION MODEL DF11				
ETCH BOARD REV B				
DRN. DATE 10-2-73				
CHKD. DATE 10/10/73				
ENG. DATE 10-18-73				
PROJ. ENG. DATE 10-18-73				
PROD. DATE 10-24-73				
NEXT HIGHER ASSY				
MPS A05 NA				
MPS A55 NA				
DEC NO. EIA NO. DEC NO. EIA NO.				
SEMICONDUCTOR CONVERSION CHART				
SCALE NONE				
SHEET 1 OF 2				
digital EQUIPMENT CORPORATION				
MAYNARD, MASSACHUSETTS				
TITLE 20 MA TO TTL CONVERTER				
SIZE CODE DCS				
NUMBER M5960-0-1				
REV. A				

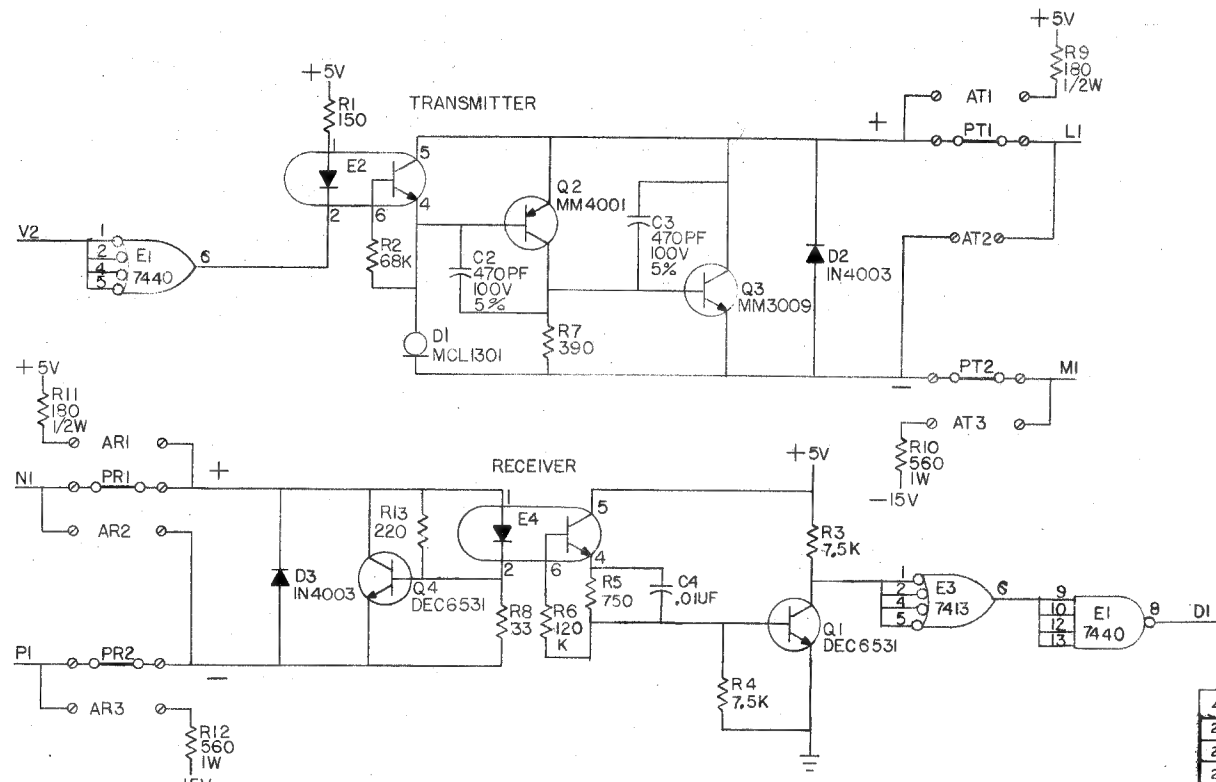
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1-Q-2333-1 SCD 2

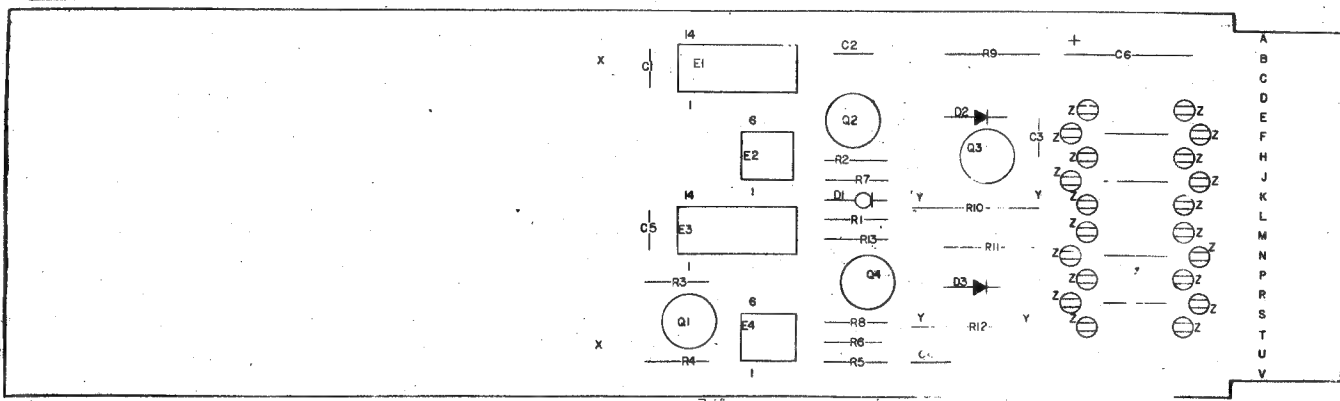
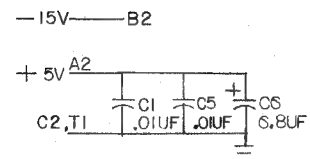
D
C
B
A



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UNLESS OTHERWISE INDICATED:
RESISTORS ARE 1/4W 5%
PIN 14 = GND ON E1, E3
PIN 7 = +5V
NOTE:
DI IS A 1.0mA CONSTANT CURRENT DIODE



QTY	REF DESIGNATION	DESCRIPTION	PART NO.	ITEM NO.
4	PT1, PT2, PR1, PR2	WIRE, BUSS, #22 AWG	9107560-01	34
2		SCREW, NYLON 6-40 x 3/8	9006401	31
2		PHENOLIC SPACER 4-40 x 3/8	9006968	32
2		TRANSI PAD	9007200	31
2		PLASTIC TRANS CAP.	9004351-0	30
1	R6	RES. 120K 1/4W 5%	1300539	28
1	R5	RES. 750 1/4W 5%	1301401	28
1	R3	I.C. DEC 7413	1909989	27
1	E1	I.C. DEC 7440	1809579	26
1		HANDLE, FLIPCHIP, MAGENTA	9008337-06	25
20		SPLITPLUG	9006735	24
2		EYELET	9006732	23
2	E2, E4	ISOLATOR OPTIC	1510727	22
1	Q3	TRANS. MM 3009	1510592	21
1	Q2	TRANS. MM 4001	1510591	20
2	Q1, Q4	TRANS. DEC 6531	1509338	19
2	R10, R12	RES. 560 1/4W 5%	1303048	18
1	R13	RES. 220 1/4W 5%	1300271	17
1	R2	RES. 68K 1/4W 5%	1301327	16
2	R3, R4	RES. 7.5K 1/4W 5%	1301422	15
1	R7	RES. 390 1/4W 5%	1300309	14
2	R9, R11	RES. 180 1/4W 5%	1300260	13
1	R1	RES. 150 1/4W 5%	1300260	12
1	R8	RES. 33 1/4W 5%	1300197	11
A/R		GRIPLET	1210244-0	10
1	D1	DIODE MCL 1301	1101616	9
2	D2, D3	DIODE 1N4003	1103448	8
1	C6	CAP. 6.8UF 35V 10%	1005306	7
3	C1, C4, C5	CAP. .01UF 100V 20% DISC	1001610	6
2	C2, C3	CAP. .470PF 100V 5% DM	1000024	5
1		ETCHED CIRCUIT BOARD	5009823	4
1		MODULE ECO HISTORY	B-MH-M598-0-6	3
1		ASSY/DRILLING HOLE LAYOUT	D-MH-M598-0-5	2
1		X-Y COORDINATE HOLE LOCATION	K-MH-M598-0-4	1

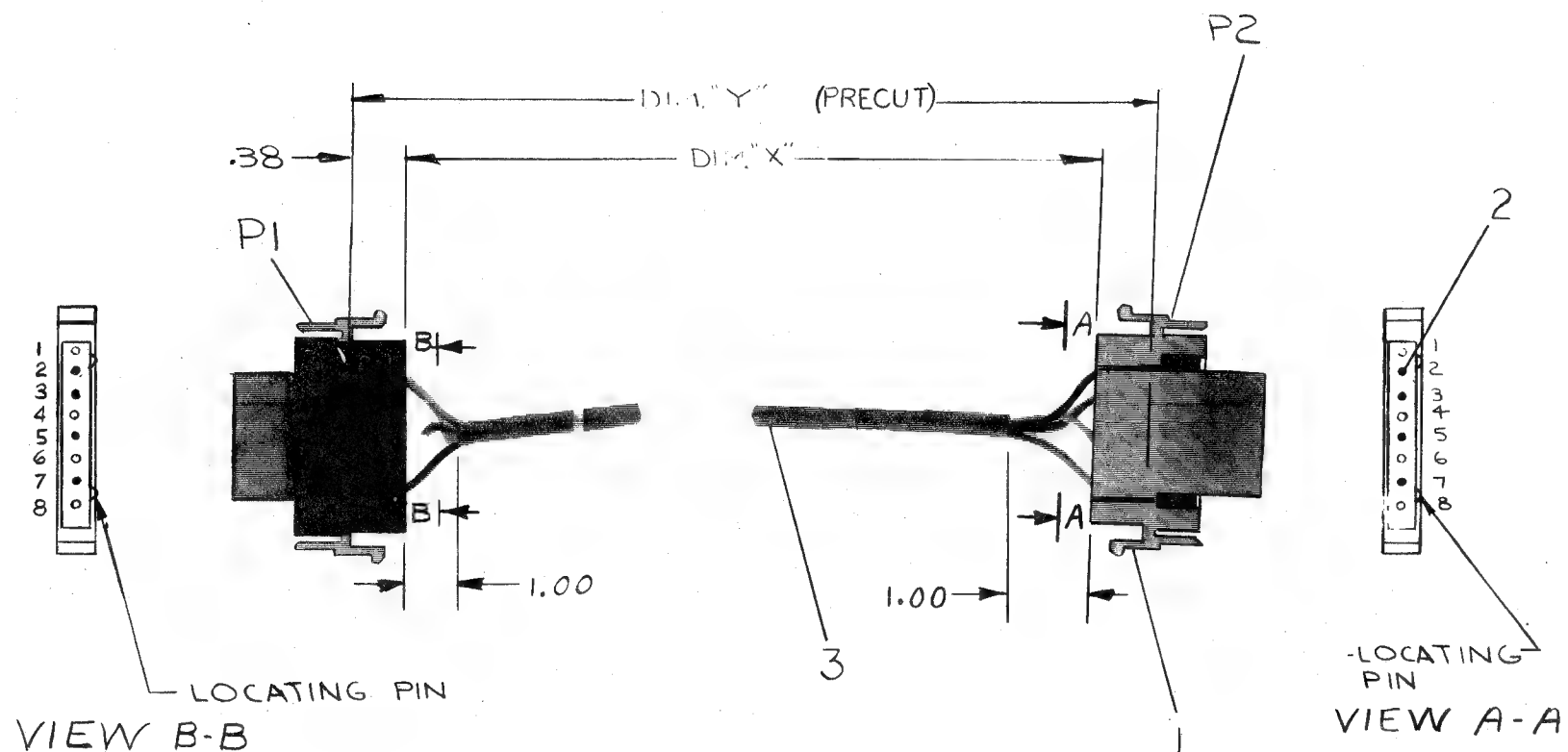
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PARTS LIST				
ETCH BOARD REV C				
DEC6531	MPS6531			
IN 4003	SAME			
MCL1301				
MM 4001				
MM 3009				
D664	IN3606			
DEC NO.	EIA NO.	DEC NO.	EIA NO.	
SEMICONDUCTOR CONVERSION CHART				
DRN. J. J. J.	DATE 11-9-71	DATE 11-9-71	DATE 11-9-71	DATE 11-9-71
CHK'D. J. J. J.	DATE 11-12-71	DATE 11-12-71	DATE 11-12-71	DATE 11-12-71
ENG. R. F. F.	DATE 11-27-71	DATE 11-27-71	DATE 11-27-71	DATE 11-27-71
PROJ. ENG. J. J. J.	DATE 11-27-71	DATE 11-27-71	DATE 11-27-71	DATE 11-27-71
PROD.	DATE	DATE	DATE	DATE
NEXT HIGHER ASSY DF 11 K				
SCALE	SCALE	SCALE	SCALE	SCALE
SHEET 1	OF 1	SHEET 1	OF 1	SHEET 1
SIZE CODE DCS	NUMBER M598-0-1	REV. D		

DEC FORM NO. 8
DRD 100-8

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LEGEND		
NUMBER	DIM X VARIATION	DIM Y (PRECUT) REF
BCØ5F-15	15 FT. ± 3 IN.	15 FT. .75 IN. ± 3 IN.

WIRE TABLE				
ITEM NO	DESCRIPTION	FROM	TO	
	AWG	COLOR	CONNECTION	CONNECTION
3	22	BLK	P1-2	P2-3
3	22	RED	P1-3	P2-2
3	22	WHT	P1-5	P2-7
3	22	GRN	P1-7	P2-5



4R	CABLE 4 CONDUCTOR	9107706	3
8	SOCKET (MALE)	1209378-03	2
2	MATE-N-LOCK (MALE)	1209340-01	1
QTY.	DESCRIPTION	PART NO.	ITEM NO.

REVISIONS		CHANGE NO.	REV.
CHK	<i>[Signature]</i>	BC05F-00001	A
		<i>S. Galloway</i>	11-5-71
		R. FITCH	
		<i>Robert Fitch</i>	11-9-71
	<i>Ed</i>	LA36 - 00119	B
	<i>Ed</i>	ENCLINUM - 717-75	
	J. BITTO		
	<i>J. Bitto</i>	718-75	

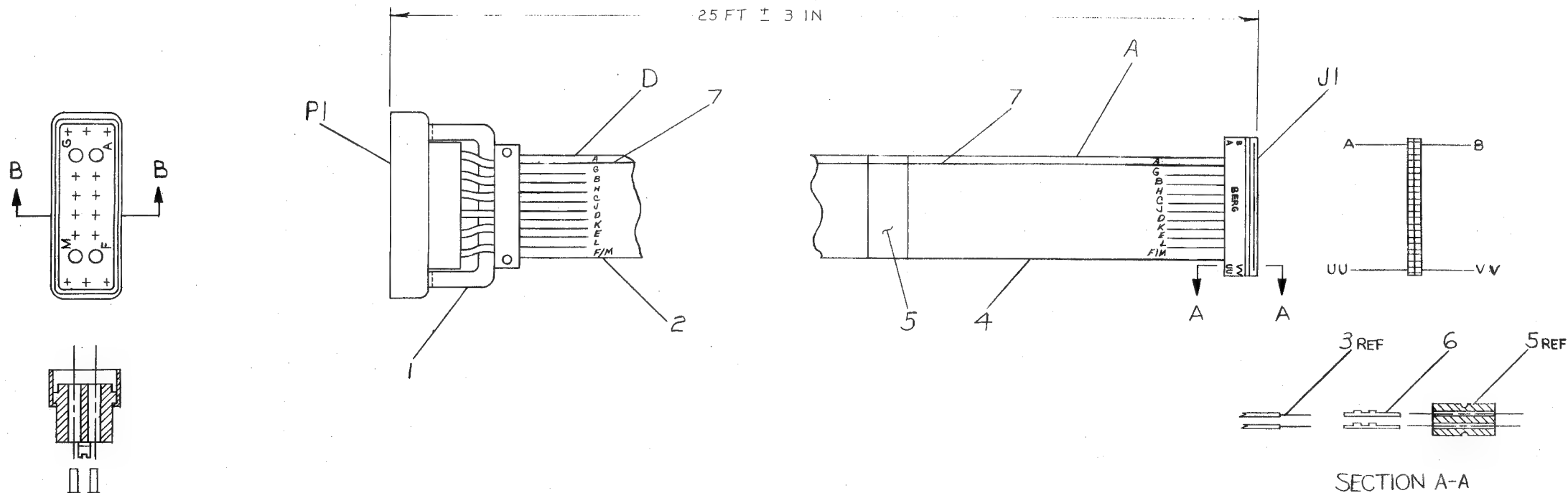
FIRST USED ON OPTION MODEL DF11		QTY.	DESCRIPTION		PART NO.		ITEM NO.	
UNLESS OTHERWISE SPECIFIED		PARTS LIST						
UNLESS OTHERWISE SPECIFIED		DRN	DATE		<div style="display: flex; align-items: center;"> <div style="border: 1px solid black; padding: 2px; margin-right: 5px;">digital</div> <div> EQUIPMENT CORPORATION <small>MAYNARD, MASSACHUSETTS</small> </div> </div>			
<div style="text-align: center;"> DIMENSION IN INCHES TOLERANCES DECIMALS FRACTIONS ANGLES ± .005 ± 1/64 ± 0°30' FINAL SURFACE QUALITY REMOVE BURRS AND BREAK SHARP CORNERS </div>		CHK'D.	DATE					
		ENG.	DATE					
		PROJ. ENG.	DATE					
		PROD.	DATE					
MATERIAL		NEXT HIGHER ASSY		<div style="display: flex; align-items: center;"> <div style="margin-right: 10px;">TITLE</div> <div> CABLE INTERFACE BC05F </div> </div>				
FINISH		SCALE						
SHEET		OF						
		SIZE CODE		NUMBER		REV.		
		C UA		BC05F-0-0		B		
		DIS.						

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FUNCTION		WIRE	CONNECTION	
CLEAR TO SEND (CS)		C COND	PI-C	J1-T
SEND REQUEST (SR)		D COND	PI-D	J1-V
SEND DATA (SD)		E COND	PI-E	J1-F
DATA SET READY (DSR)		F COND	PI-F	J1-Z
RING INDICATOR (RI)		F SHIELD	PI-F	J1-X
LOCAL TEST (LT)		G COND	PI-G	J1-FF
SERIAL CLOCK TRANSMIT (SCT)		H COND	PI-H	J1-L
SERIAL CLOCK TRANSMIT (SCT)		J COND	PI-J	J1-N
RECEIVE DATA (RD)		K COND	PI-K	J1-J
SERIAL CLOCK RECEIVE (SCR)		L COND	PI-L	J1-R
AGC LOCK AGC		M COND	PI-M	J1-BB
DATA TERMINAL READY (DTR)		M SHIELD	PI-M	J1-DD
		C SHIELD	PI-C	J1-A
		D SHIELD	PI-D	J1-A
		E SHIELD	PI-E	J1-B
		G SHIELD	PI-G	J1-B
		H SHIELD	PI-H	J1-VV
		J SHIELD	PI-J	J1-VV
		K SHIELD	PI-K	J1-UU
		L SHIELD	PI-L	J1-UU
		A	PI-A	NC
		B	PI-B	NC

WIRE REFERENCE TABLE	
TRACER	LOCATION OF WIRES IN WOVEN CABLE
A	
B	
G	
H	
C	
J	
D	
K	
E	
L	
F	
M	

- NOTES:
- A TWISTED PAIR WIRE 6 IN. LONG WILL BE ATTACHED TO EACH CONDUCTOR OF EACH WIRE (1 WIRE TO INNER CONDUCTOR, 1 WIRE TO THE SHIELD). THE WIRES WILL THEN BE CRIMPED TO THE BERG PINS AS INDICATED.
 - WHEN SUPPLIED BY A VENDOR THIS CABLE WILL BE FULLY TESTED BY VENDOR. TESTED AND INSPECTED BY INCOMING INSPECTION PRIOR TO ACCEPTANCE.
 - THIS IS THE CABLE DESCRIBED BY PURCHASE SPECIFICATION 11-00019.
 - A COLORED TRACER WILL BE WOVEN INTO THE CABLE BETWEEN WIRES A AND G.
 - RG195 A/U CAN BE USED TO DIRECTLY REPLACE RG 180U.
 - NO SUBSTITUTIONS, OTHER THAN THOSE SPECIFIED IN THIS PRINT, MAY BE MADE WITHOUT PRIOR APPROVAL.

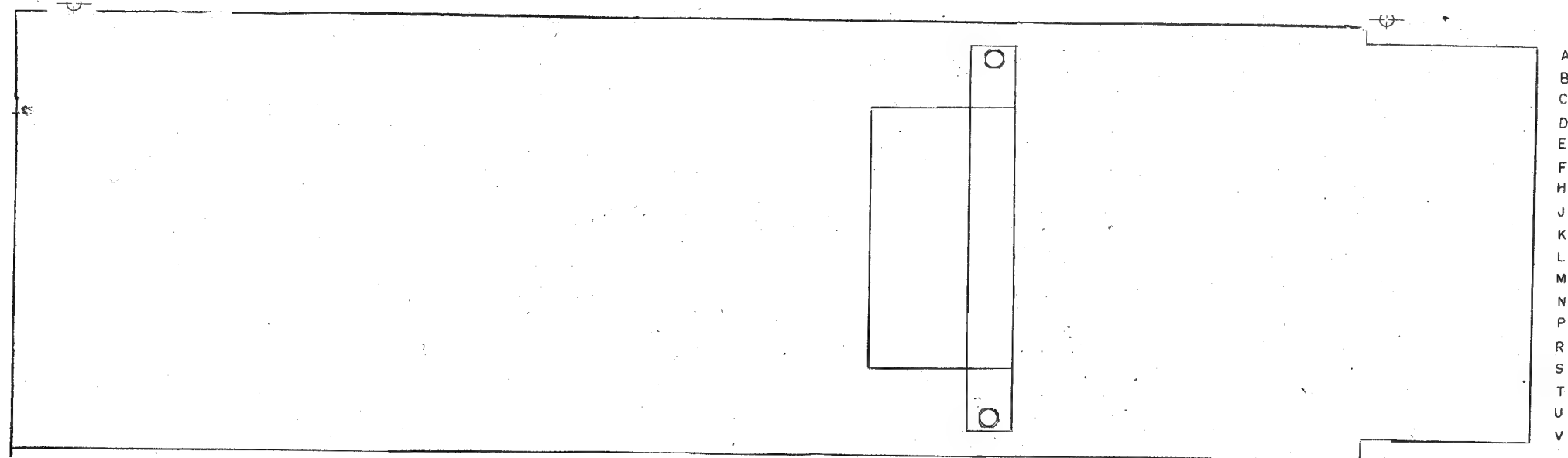


A/R	COLORED TRACER		7
A/R	BERG PINS	12-10087-	6
A/R	INSULATION		5
A/R	WIRE 26/28 AWG TWP		4
1	CONN BERG	12-10090-0-0	3
A/R	CABLE COAX RG180 B/U		2
1	BURNDY MO12 MXP-17TC		1

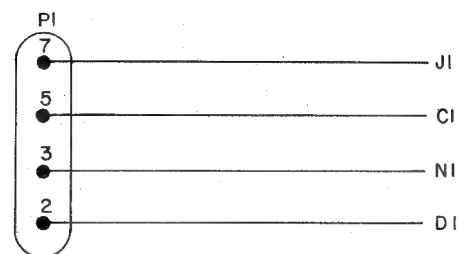
FIRST USED ON OPTION/MODEL	QTY.	DESCRIPTION	PART NO.	ITEM NO.
PARTS LIST				
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES. TOLERANCES	DATE 2-1-72	digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS		
DECIMALS .XXX = .005	DATE 3-23-72	TITLE		
ANGLES ± 0° 30'	DATE 3-23-72	HIGH SPEED MODEM CABLE		
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY	DATE 3-23-72	MATERIAL		
FINISH	DATE 3-27-72	NEXT HIGHER ASSY.		
SCALE	SHEET 1 OF 1	DIST. 10		
SIZE CODE		NUMBER		REV.
DUA		BCOIW-0-0		A

REVISIONS	CHANGE NO.	REV.
1	BCOIW-00001	A
2	BCOIW-00001	A
3	BCOIW-00001	A
4	BCOIW-00001	A
5	BCOIW-00001	A
6	BCOIW-00001	A
7	BCOIW-00001	A
8	BCOIW-00001	A
9	BCOIW-00001	A
10	BCOIW-00001	A
11	BCOIW-00001	A
12	BCOIW-00001	A
13	BCOIW-00001	A
14	BCOIW-00001	A
15	BCOIW-00001	A
16	BCOIW-00001	A
17	BCOIW-00001	A
18	BCOIW-00001	A
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25	BCOIW-00001	A
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27	BCOIW-00001	A
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37	BCOIW-00001	A
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92	BCOIW-00001	A
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94	BCOIW-00001	A
95	BCOIW-00001	A
96	BCOIW-00001	A
97	BCOIW-00001	A
98	BCOIW-00001	A
99	BCOIW-00001	A
100	BCOIW-00001	A

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A
B
C
D
E
F
H
J
K
L
M
N
P
R
S
T
U
V



2	RIVETS	9007266	33
4	FEED THRU EYELET	9006731	12
2	WASHER	9006693	11
2	WASHER	9006693	11
2	WASHER	9006693	11
2	WASHER	9006693	11
1	handle, ELIP CHIP - MAGENTA	9008337-06	8
2	eyelet	9006732	7
4	PINS	1209456	6
1	PIN HOUSING	1209340-0-0	5
1	ETCHED CIRCUIT BOARD	5009597	4
	MODULE ECO HISTORY	B-MH-M973-0-6	3
	ASSY/DRILLING HOLE LAYOUT	B-AH-M973-0-5	2
	X-Y COORDINATE HOLE LOCATION	K-CO-M973-0-4	1
QTY.	REF DESIGNATION	DESCRIPTION	DEC PART NO.
		PARTS LIST	

REVISIONS	CHK	CHG	NO.	REV.
			000001	A

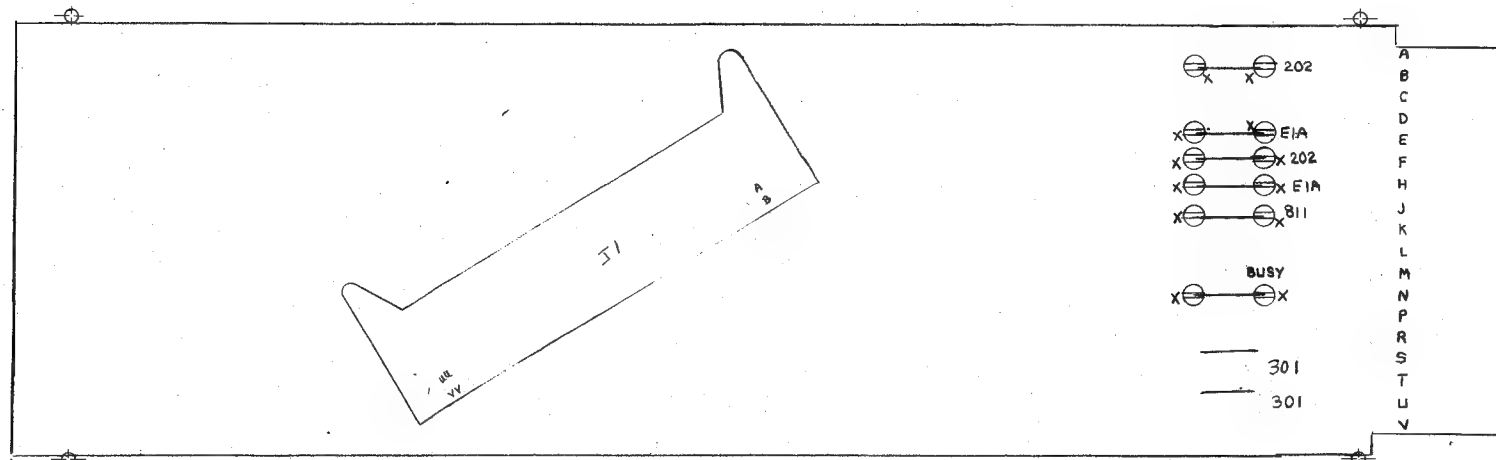
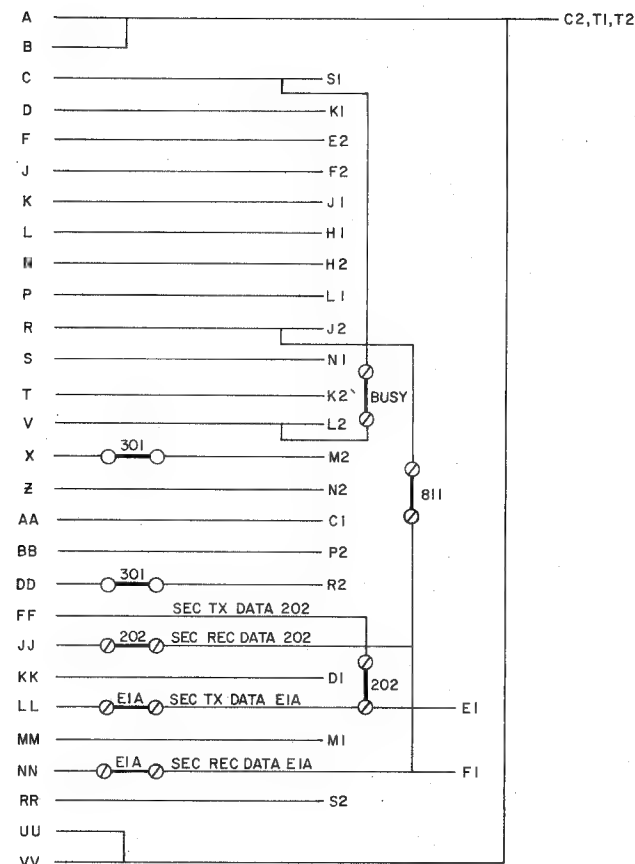
DATE	5/11/71
DATE	5/13/71
DATE	5/21/71
DATE	

TRANSISTOR & DIODE CONVERSION CHART			
DEC	EIA	DEC	EIA

digital
EQUIPMENT CORPORATION
MAYNARD, MASSACHUSETTS

TITLE TTY CABLE CONNECTOR			
SIZE	CODE	NUMBER	REV.
C	CS	M973-0-1	A
PRINTED CIRCUIT REV.			
A			

1. FUNCTIONS OF MODEM JUMPERS (WHEN INSTALLED)
- A. EIA — SECONDARY TRANSMIT & RECEIVE DATA LINES TO EIA PINS 14 & 16
 - B. 202 — SECONDARY TRANSMIT & RECEIVE DATA LINES TO EIA PIN 11 & 12
 - C. 301 — ALLOW OPERATION OF RING AND DATA TERMINAL READY FUNCTIONS WITH BELL 303 SERIES
 - D. 811 — BELL 811B RESTRAINT FUNCTION IS MONITORED BY SECONDARY RECEIVE
 - E. BUSY — BELL 811B FORCE BUSY FUNCTION ANDED WITH REQUEST TO SEND
2. 301 — REMOVE FOR BELL 301 USE ONLY



QTY.	REF. DESIGNATION	DESCRIPTION	DEC PART NO.	REV
1		HANDLE, FLIP CHIP - MAGENTA	9008337-06	8
12		SPLIT LUGS	9006735	7
2		RYELETS	9006732	6
1	J1	CONN HOP RT ANG HEADER	1209981	5
1		ETCHED CIRCUIT BOARD	5009752	4
		MODULE ECO HISTORY	B-M-M970-0-6	3
		ASSY/DRILLING HOLE LAYOUT	D-M-M970-0-5	2
		X-Y COORDINATE HOLE LOCATION	K-Q-M970-0-4	1

DRN S. Cooper DATE 10-5-71
CHK'D M. Jelle DATE 10-6-71
ENG R. Jelle DATE 10-6-71
PROD DATE

TRANSISTOR & DIODE CONVERSION CHART			
DEC	EIA	DEC	EIA

digital EQUIPMENT CORPORATION
MAYNARD, MASSACHUSETTS

TITLE: CABLE INTERFACE BD, #1
SIZE: D CS
NUMBER: M970-0-1
REV: C
PRINTED CIRCUIT REV: D

ITEM NO	PART NO.	DESCRIPTION
1	A-PL-M594-0-0	EIA/CCITT CONVERTER
2	D-CS-M595-0-1	CURRENT MODE CONVERTER BELL 301, 303
3	D-CS-M5960-0-1	20 MA TO TTL CONVERTER
4	A-PL-M970-0-0	8.5 FLIP CHIP/40 PIN HEADER
5	A-PL-M973-0-0	8.5 FLIP CHIP/MATE-N-LOCK
6	D-UA-BC01R-25-0	BC01R CABLE ASSEMBLY
7	A-PL-M598-0-0	PASSIVE 20MA TO TTL
8	C-UA-BC05F-15-0	CABLE INTERFACE, BC05F-15
9	D-UA-BC01W-25-0	HIGH SPEED MODEM CABLE
10	A-PS-20M586-0-0	ASYNCH MODEM 300 BAUD ORIG
11	A-PS-20M587-0-0	ASYNCH MODEM 300 BAUD ANS
12	D-UA-BC11E-0-0	MODEM TO DAA CABLE

[illegible]

CHK	CHANGES	REV.
17	CHANGE NO. 0001	A
	DF11-00001	
	8-5-71	
	MCNAMARA	
	<i>Ed E. McNamara</i>	
18	DF11-00002	B
	Cancelled 10-12-71	
	MC NAMARA	
	<i>Ed E. McNamara</i>	
19	DF11-00003	C
	8 Wilson 11-11-71	
	J. MCNAMARA	
	<i>Ed E. McNamara</i>	
20	DF11-00004	D
	4-17-72	
	MC NAMARA	
	<i>Ed E. McNamara</i>	
21	DF11-00006	E
	8-15-72	
	3-30-73	
	J. MCNAMARA	
	<i>Ed E. McNamara</i>	
22	DF11-00009	F
	5-23-74	
	J. MCNAMARA	
	<i>Ed E. McNamara</i>	

FIRST USED ON OPTION/MODEL + + +		UNLESS OTHERWISE SPECIFIED		DIN. K. RUSS 3/18/71		digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS	
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES TOLERANCES DECIMALS FRACTIONS ANGLES ± .005 ± 1/64 ± 0°30'		CHK'D. A. Raymond 3-22-71		DATE 3-22-71		TITLE LEVEL CONVERTERS AND CABLES	
FINAL SURFACE QUALITY ✓ REMOVE BURRS AND BREAK SHARP CORNERS		ENG. [Signature] 3-25-71		DATE 3-25-71			
		PROJ. ENG. [Signature] 3-25-71		DATE 3-25-71			
		PROD. [Signature] 3-26-71		DATE 3-26-71			
MATERIAL + + +		NEXT HIGHER ASSY. + + +		SIZE CODE C PL		NUMBER DF11-0-0	
FINISH + + +		SCALE + + +		REV. F			
		SHEET 1 OF 1		DIST.			

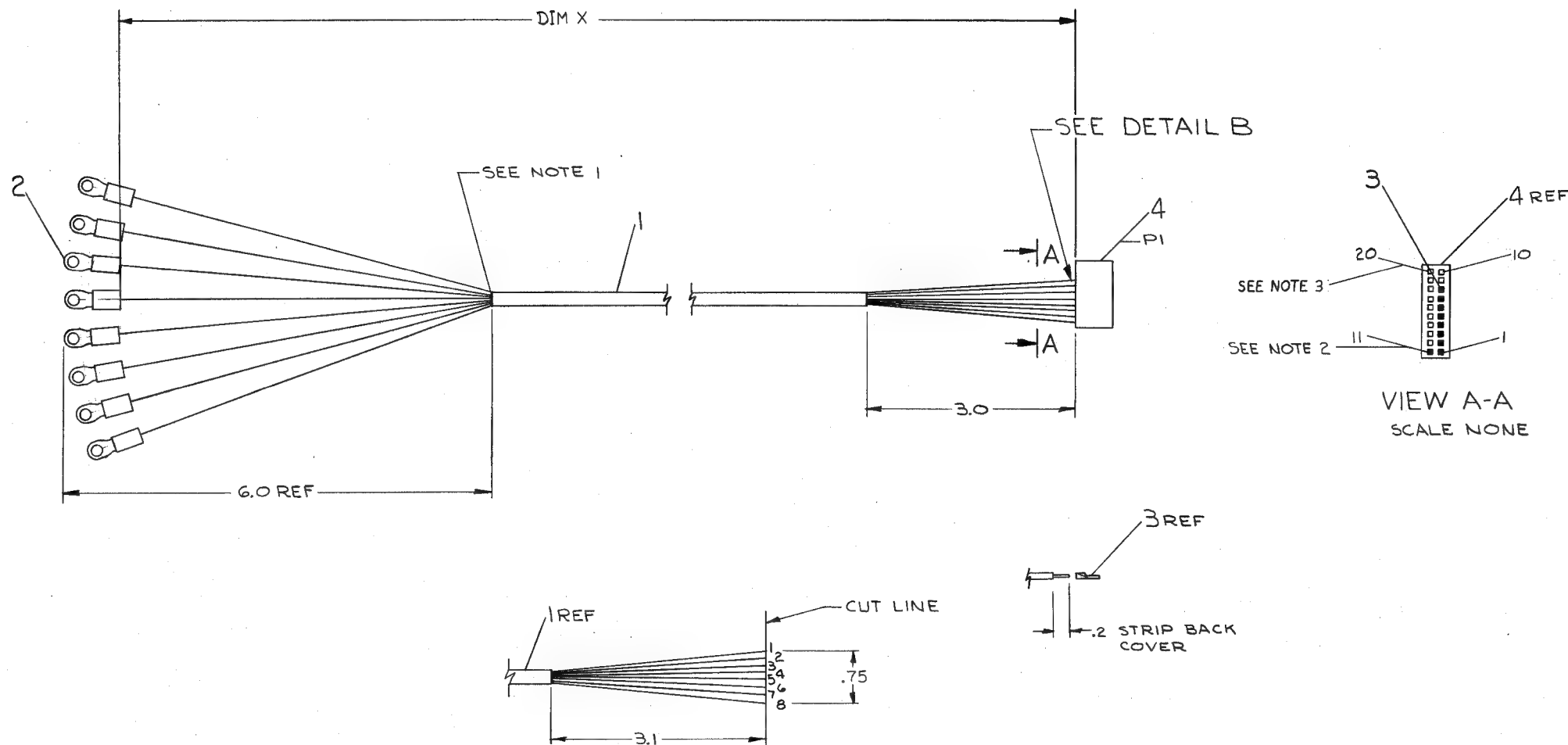
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1972

WIRE TABLE							
ITEM NO	AWG	COLOR	FROM		TO		CUT POINT
			CONNECTION	WITH	CONNECTION	WITH	
1	22	RED	---	2	PI-1 (DA)	3	8
		GRN	---		PI-2 (OH)		7
		BLU	---		PI-3 (SH)		6
		WHT	---		PI-4 (CCT)		5
		ORN	---		PI-5 (DR)		4
		VIO	---		PI-6 (DT)		3
		YEL	---		PI-7 (RI)		2
1	22	BLK	---	2	PI-8 (GND)	3	1

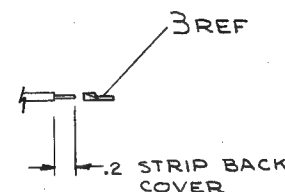
LEGEND		
NUMBER	VARIATION	
	DIM X	DIM Y (PRECLT)
BC11E-25	25' ± 3"	25' ± 3"-0"

NOTES:

- TWO WIRES (GRY, BRN) ARE TO BE CUT BACK AT INSULATION BOTH ENDS.
- PI-11 IS A DUMMY PIN, USED FOR REFERENCE ONLY.
- PI-20 IS TO BE NEXT TO ARROW ON CONNECTOR HOUSING ON MODEM WHEN PI IS PLUGGED IN.



DETAIL B
DO NOT REDUCE



1	RECEPTACLE 20 PIN 65043-027 BERG	1210918-27	4
9	MINI-TERMINAL #47783 BERG	1210089-6	3
8	CONN ARKLESS #50360-1	9007930	2
A/R	CABLE 10 CONDUCTOR	9107623	1
QTY.	DESCRIPTION	PART NO.	ITEM NO.

FIRST USED ON OPTION/MODEL
DF11-BA#-BB

DO NOT SCALE DRAWING
UNLESS OTHERWISE SPECIFIED
DIMENSION IN INCHES

TOLERANCES
DECIMALS FRACTIONS ANGLES
± .005 ± 1/64 ± 0°30'
FINAL SURFACE QUALITY
REMOVE BURRS AND BREAK SHARP CORNERS

MATERIAL
FINISH

DRN. DATE 7/16/72
CHKD. DATE 7/27/72
ENG. DATE 7/27/72
PROJ. ENG. DATE 7/27/72
PROD. DATE 10-3-72
NEXT HIGHER ASSY

PARTS LIST
digital EQUIPMENT CORPORATION
MAYNARD, MASSACHUSETTS

TITLE
MODEM TO DAA
CABLE (BC11E)

SIZE CODE NUMBER REV.
DUABCIIE-0-0 B

SCALE 1/1
SHEET 1 OF 1

REVISIONS		CHANGE NO.		REV.	
CHK	BC11E-00001	A	11-27-72		
W. SMITH	BC11E-00002	B	3-1-73		
W. SMITH	BC11E-00003	C	3-1-73		

DEC FORM NO.
DRD 100



QTY	REF DESIGNATION	DESCRIPTION	PART NO.	ITEM NO.
PARTS LIST				
ETCH BOARD REV	A			
		DRN <i>12/19/73</i> DATE <i>7/14/73</i> CK'D <i>S</i> DATE <i>8/14/73</i> <i>W. S. M. Newman</i> ENG. DATE <i>7/14/73</i> <i>W. S. M. Newman</i> PROJ. ENG. DATE <i>8/14/73</i> <i>W. S. M. Newman</i> PROD. DATE <i>8/14/73</i> <i>B. S. Davis</i> NEXT HIGHER ASSY	digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS	
DEC NO.	EIA NO.	TITLE ASYNC ORIGINATE MODEM		
		SIZE CODE DCS	NUMBER M586-Ø-1	REV. B
CONVERSION CHART		SCALE <i>1</i> OF <i>2</i> SHEET <i>1</i> OF <i>2</i>		


GND AND 5V ARE USUALLY PIN 7 AND 14
RESPECTIVELY EXCEPTIONS ARE STATED ABOVE

IC PIN LOCATIONS

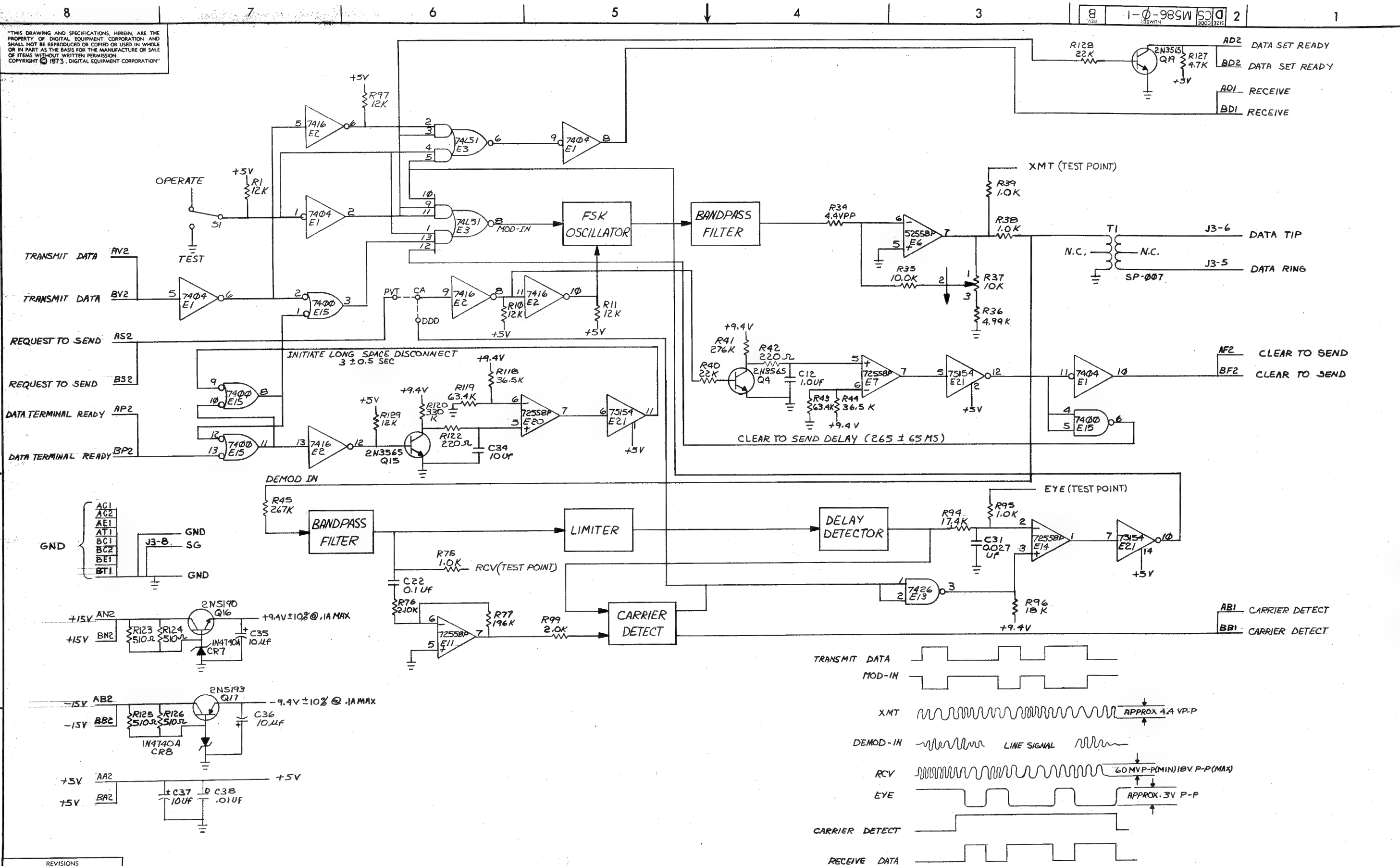
CHK	CHANGE NO.	REV
	ORIGINATED	A
	M 586-00001	B
	P. Vargan	
	J. Mc NAMARA	
	SLR: Parnass 3-21-74	

FIRST USED ON OPTION MODEL			
DF11 - BA		ETCH BOARD REV	
		A	
REVISIONS			
DEC NO.	EIA NO.	DEC NO.	EIA NO.
SEMICONDUCTOR CONVERSION CHART			

DRN	7/12/73	DATE	7/12/73
CHK'D	8/19/73	DATE	8/19/73
ENG	8/19/73	DATE	8/19/73
PROD. ENG.	8/14/73	DATE	8/14/73
PROD.	8/14/73	DATE	8/14/73
NEXT HIGHER ASSY			
SCALE 1 1			
SHEET 1 OF 2			

				EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS			
TITLE ASYNC ORIGINATE MODEM							
SIZE/CODE DJS		NUMBER M586-0-1				REV. B	
DIST.							

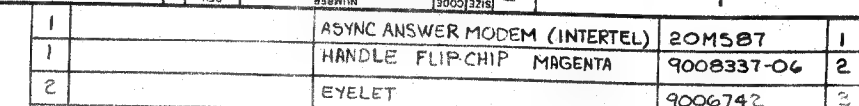
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REVISIONS		
CHK	CHANGE NO.	REV.

TITLE		SIZE CODE	NUMBER	REV.
ASYNC ORIGINATE MODEM		D CS	M586-0-1	B
SCALE	SHEET 2 OF 2	DIST.		

NOTES:

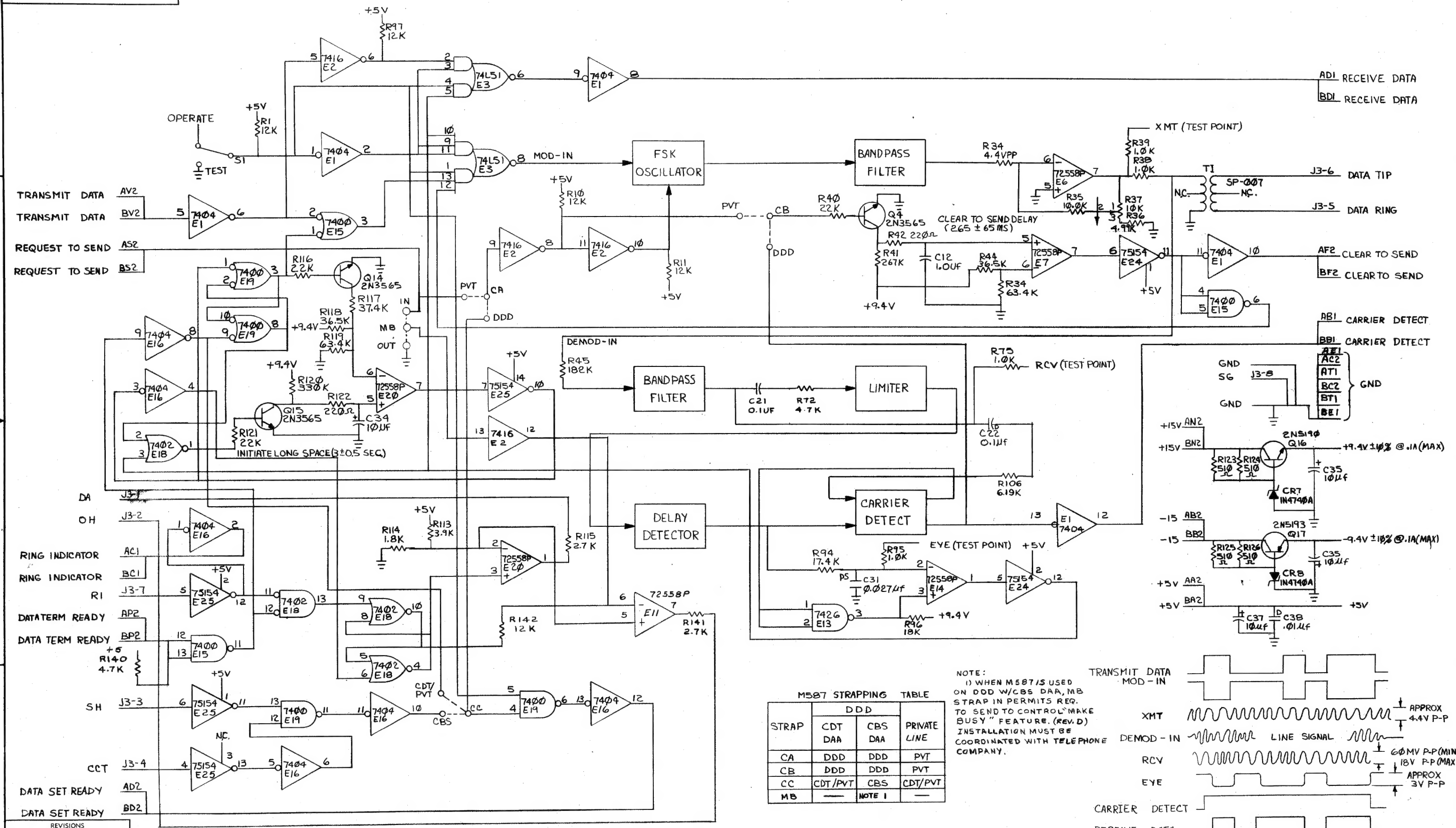
[illegible]

BRUNING 40-522 16699

IC TYPE	GND	+ 5V
GND AND 5V ARE USUALLY PIN 7 AND 14 RESPECTIVELY EXCEPTIONS ARE STATED ABOVE		
IC PIN LOCATIONS		

DEC FORM NO
DRD-135A

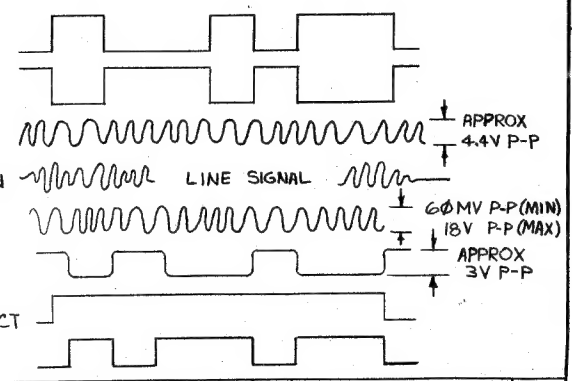
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M587 STRAPPING TABLE

STRAP	DDD			PRIVATE LINE
	CDT	CBS	DAA	
CA	DDD	DDD	PVT	
CB	DDD	DDD	PVT	
CC	CDT/PVT	CBS	CDT/PVT	
MB	---	NOTE 1	---	

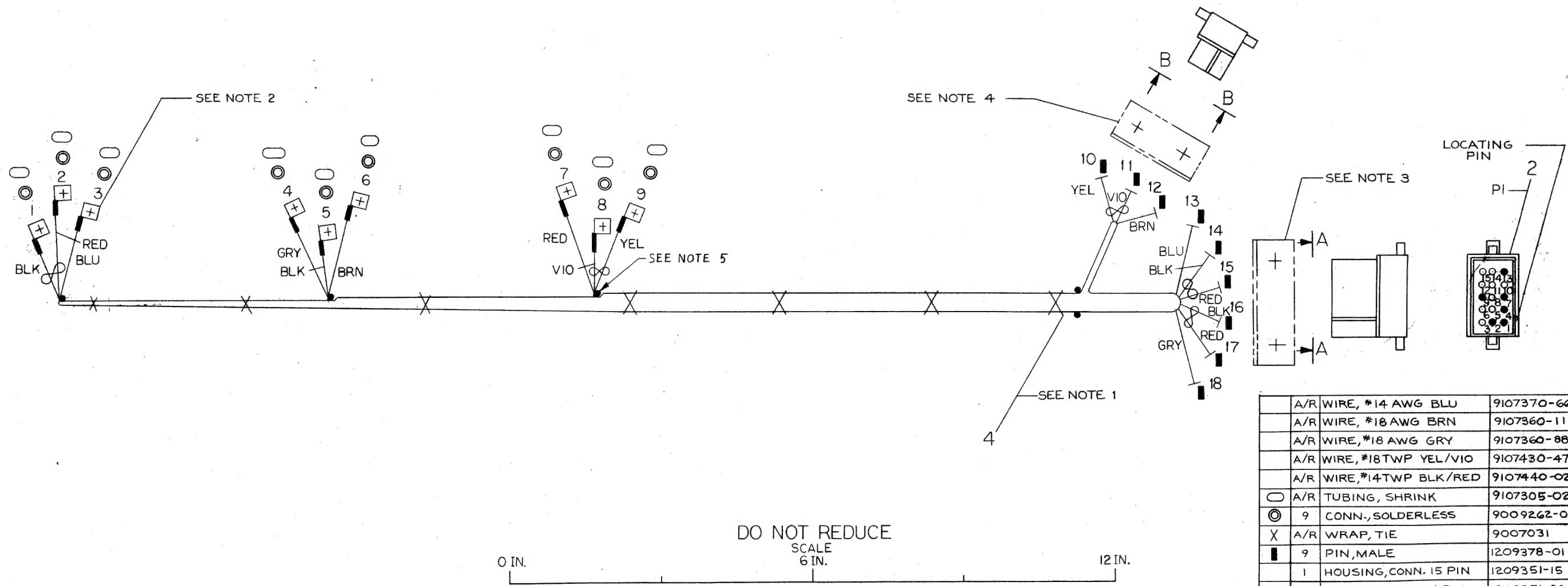
NOTE:
1) WHEN M587/5 USED ON DDD W/CBS DAA, MB STRAP IN PERMITS REQ. TO SEND TO CONTROL "MAKE BUSY" FEATURE (REV.D) INSTALLATION MUST BE COORDINATED WITH TELEPHONE COMPANY.



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DIGITAL EQUIP. CORP.

WIRE TABLE									REMARKS
ITEM DESCRIPTION		FROM				TO			
NO	AWG	COLOR	POINT	CONNECTION	TERM	POINT	CONNECTION	TERM	
7	14 TWP	RED	7		5,6	17	P1-1	3	+5V
		BLK	5		↑	16	P1-7	↑	GND
9	18 AWG	GRY	4			18	P1-2		+15
7	14 TWP	RED	2			15	P1-4		+5
		BLK	1			14	P1-9		GND
11	14 AWG	BLU	3			13	P1-13		-15
10	18 AWG	BRN	6			12	P2-2		LINE CLOCK
8	18 TWP	VIO	8		↓	11	P2-3	↓	DC LO
		YEL	9		5,6	10	P2-4	3	AC LO

- NOTES:
1. USE TIE WRAPS (X) ITEM 4 APPROXIMATELY EVERY THREE (3) INCHES WHEN NECESSARY, AND AT EVERY BREAK-OUT POINT.
 2. ATTACH MALE FASTON DEC 9008219-0 WITH #4 WOOD SCREWS (9 PLACES).
 3. USE CONN. BRKT C-MD-9305761-H15-0 MOUNT WITH #6 WOOD SCREWS. USE MATING CONN. 1209350-15.
 4. USE CONN. BRKT C-MD-9305761-H6-0 MOUNT WITH #6 WOOD SCREWS. USE MATING CONN. 1209350-06.
 5. DOT (•) INDICATES NAIL LOCATIONS FOR ASSEMBLY USE ONLY. COVER NAILS WITH SHRINK TUBING TO PREVENT CUTTING HARNESS.



DO NOT REDUCE
SCALE
6 IN.

DO NOT BUILD FROM REDUCED PRINT

	A/R WIRE, #14 AWG BLU	9107370-66	11
	A/R WIRE, #18 AWG BRN	9107360-11	10
	A/R WIRE, #18 AWG GRY	9107360-88	9
	A/R WIRE, #18 TWP YEL/VIO	9107430-47	8
	A/R WIRE, #14 TWP BLK/RED	9107440-02	7
○	A/R TUBING, SHRINK	9107305-02	6
⊙	9 CONN., SOLDERLESS	9009262-0	5
X	A/R WRAP, TIE	9007031	4
■	9 PIN, MALE	1209378-01	3
	1 HOUSING, CONN. 15 PIN	1209351-15	2
	1 HOUSING, CONN. 6 PIN	1209351-06	1

FIRST USED ON OPT/MOD	SYM	QTY.	DESCRIPTION	PART NO.	ITEM NO.
PARTS LIST					
UNLESS OTHERWISE SPECIFIED DIMENSION IN INCHES. TOLERANCES		DRN. <i>Carl McLy</i> 9-26-73	DATE <i>10/1/73</i>	digital EQUIPMENT CORPORATION MAYNARD, MASSACHUSETTS	
DECIMALS	ANGLES	ENG. <i>Paul Bozen</i> 11/3/73	DATE <i>11/3/73</i>	TITLE POWER HARNESS DA11-F/DD11-B	
.XXX = .005	± 0° 30'	PROJ. ENG. <i>Paul Bozen</i> 11/3/73	DATE <i>11/3/73</i>	SIZE CODE DIA7009563-0-0	
.XX = .02		PROP. ENG. <i>Jack Horner</i> 10/11/73	DATE <i>10/11/73</i>	NUMBER REV.	
.X = .1				SHEET 1 OF 1	
REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY		DIST.			
MATERIAL		NEXT HIGHER ASSY.			
SEE PARTS LIST		SCALE 1/1			
FINISH		SHEET 1 OF 1			

REV.	
CHG	
CHK	

